ROYAL COMMISSION ON THE PUBLIC SERVICES IN INDIA.

APPENDIX
TO THE
REPORT
OF
THE COMMISSIONERS.

Volume XIX.

MINUTES OF EVIDENCE
RELATING TO THE
RAILWAY DEPARTMENT
Taken at Delhi, Calcutta, and London,
WITH
APPENDICES.

Presented to both Houses of Parliament by Command of His Majesty.

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MINUTES OF EVIDENCE

TAKEN BEFORE THE

ROYAL COMMISSION

ON THE

PUBLIC SERVICES IN INDIA

RELATING TO THE

RAILWAY DEPARTMENT

At Delhi, Thursday, 13th November, 1913.

PRESENT:

THE RIGHT HON. THE LORD ISLINGTON, G.C.M.G., D.S.O. (*Chairman*).

THE EARL OF RONALDSHAY, M.P.
Sir MURRAY HAMMICK, K.C.S.I., C.I.E.
Sir THEODORE MORISON, K.C.I.E.
Sir VALENTINE CHIROL.
MAHADEV BHASKAR CHAUBAL, Esq., C.S.I.
ABDUR RAHIM, Esq.
WALTER CULLEY MADGE, Esq., C.I.E.
FRANK GEORGE SLY, Esq., C.S.I.
JAMES RAMSAY MACDONALD, Esq., M.P.

R. R. SCOTT, Esq. (Joint *Secretary*).

T. RYAN, Esq., Officiating Secretary to the Railway Board.

Written Statement on the State Railway* **Service.**

80,844. *Preliminary Note*.—In submitting the attached memoranda in compliance with the request received by me, I desire to explain that my service in India has been as briefly summarized here : —

1898. Joined the Public Works Department (on recruitment from the R. I. E. College, Cooper's Hill) as an Assistant Examiner of Accounts. Employed at first in the Public Works Department, Bombay.

1900. North-Western Railway. Assistant Examiner of Accounts.

1901. South Indian Railway. Deputy Government Examiner.

1903. Rohilkund and Kumaon Railway. Government Examiner.

1904. Great Indian Peninsula Railway. Deputy Government Examiner.

1905. Southern Mahratta Railway. Government Examiner.

1905. B. G. J. P. Railway. Examiner of Accounts and Secretary. Board of Control (Officiating Manager for four months.)

1907. On seven months' leave.

1908. Southern Mahratta Railway. Government Examiner of Accounts.

1908. Eastern Bengal Railway. Attached to Audit Office.

1908. Assistant Accountant General, Public Works Department.

1909. Oudh and Rohilkhand Railway. Attached to Audit Office.

1910. Assistant Accountant General, Railways.

1913. Appointed (May) to officiate as Secretary to the Railway Board.

Any opinions expressed by me, therefore, in respect of the Government railway services to which my evidence relates are necessarily based upon a limited personal State railway experience, supplemented largely by impressions gained on non-State Railways, at Headquarters, and by what I have gathered in conversation with other officers.

The views to which I have given expression represent my personal opinions, and Government is in no way a party to, or responsible for, them.

The following Memoranda are submitted : —

	Paragraphs.
(1) On the Railway Engineer Establishment	80,845–852
(2) On the Railway Traffic Establishment	80,853–860
(3) On the Railway Locomotive and Carriage and Wagon Establishment	80,861–868
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(8) On the Railway Mining Engineer Establishment	80,899–905
(9) On the Railway Coal Superintendent Establishment ...	80,906–911
(10) On the Railway Medical Establishment	80,912–920
(11) A special note on the State Railway Provident Fund	80,921
(12) A note containing some observations on the subject of appeals.	80,922

I may remark that no mention is made of the Audit Department as the Audit Officers employed on Railways are members of the Indian Finance Department.

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* A supplementary statement was put in by Mr. Ryan after his oral examination and has been printed as Appendix IV.

(848—3.) Wt. L 3490/12. 1800. 8/15. D & S.

(1) *MEMORANDUM ON THE ENGINEER ESTABLISHMENT.*

80,845. **(I.) Methods of recruitment.** — The Superior Engineer Establishment of State Railways is divided practically into three classes, *viz.*: —

(*a*) The Imperial Engineer Establishment.
(*b*) The Provincial Engineer Establishment.
(*c*) The Temporary Engineer Establishment.

The officers included in (*a*) and (*b*) count against the sanctioned permanent cadre of 181 permanent officers. There is not at present a definite rule prescribing the division of the cadre between these two classes. It is the existing practice to recruit two provincial engineers per annum. Proposals are however under consideration for an increase of the cadre to 200, divided into 139 Imperial and 61 Provincial Engineers. The recruitment would of course be so regulated as to work up ultimately to this strength. The actual existing division is as follows: —

Imperial Engineers.		Provincial Engineers.	Total actual.	Cadre.
Royal Engineers.	Civil Engineers.			
38	119	26	183*	181

and 58 Temporary Engineers are employed at present.

As regards the employment of Royal Engineers, it should be explained that the Railway Department provides appointments for 50 Royal Engineers in all, this number is not divided by rule among the Engineer Establishment and others. At present there are 38 employed as Engineers, as above, and the rest are distributed among the Traffic and Agency Departments—

(*a*) Recruits for the Imperial Service are appointed by the Secretary of State from England, and by the Railway Board from among junior officers of the Royal Engineers borne on the Indian Establishment.

Assistant Engineers are sent out annually from England according to the requirements of the Public Works and Railway Departments. The conditions of appointment are shown in Appendix I.

(*b*) The Provincial Service is recruited from qualified students of the Thomason Civil Engineering College, Rurki, and from the Upper Subordinate Establishment of the Engineering Department. Two passed students of the College are appointed to railways every year after a course of practical training, and one Upper Subordinate is promoted every alternate year to the Engineer Establishment.

(*c*) Temporary Engineers are picked up as required in the open market in India.

The Railway Department requires a large staff of the most efficient and reliable engineers for the (i) maintenance and execution of works on existing open lines, (ii) surveys, (iii) new construction, (iv) for the appointments of Government Inspectors, and (v) for appointments at the Railway Board's headquarters. The existing sanctioned permanent cadre is as follows: —

Chief Engineers	5
Superintending Engineers	15
Executive and Assistant Engineers ...	161
Total	181

In addition to the permanent staff (the actuals being 183*) who count against this cadre there are employed at present 58 Temporary Engineers who mostly hold the position and draw the pay of Assistant Engineers. This makes a total present strength of 241 Engineers. This is at a time when there are no important surveys in hand, and there is in hand little construction of new lines by the agency of the State.

I regard the fact that in these circumstances it is necessary to employ so many temporary men, as a plain indication that the existing permanent cadre is entirely inadequate. The cadre should, in my personal opinion, be revised on the following lines: —

It should take account of the probable permanent requirements of the existing railways, and of lines shortly to be opened, of the special posts enumerated under heads (*iv*) and (*v*) *ante*, and should make a reasonable allowance for a probable *average* amount of survey, construction, and other special work, a sufficient addition being made for a reserve for officers on leave.

A reasonable cadre of permanent engineers could thus be fixed which would admit of the employment of a proper number of officers of the necessary qualifications sufficient to meet the normal requirements of Government. If in particular years it should prove necessary for Government to carry on more work than the existing sanctioned cadre permitted then, and then only, should deficiencies be filled by the employment of the best available Temporary Engineers. A careful revision of the cadre on these lines would, I believe, probably reveal a case for an increase not merely of the total permanent cadre but also of the number of supervising and executive engineers' charges included in it. If this were so, there probably would be no ground for the complaint, for which there would otherwise be occasion, that the increase would lead to a block of promotion into these classes.

The chief objection to the scheme which I think might be raised is that it would lead to a considerable surplus of Government engineers in excess of requirements in years when there was less than an average amount of work to be done—this would be apt to occur chiefly when owing to financial difficulties the supply of funds for construction of railways had to be much restricted. It appears to me that this difficulty could easily be obviated by the extension of the policy of the construction of railways for private companies by the State, or otherwise by freely lending, temporarily, the services of the surplus Government staff particularly in those cases in which it might be proposed that the lines when constructed should be worked for the owners by, or on behalf of, Government. This would be a plan decidedly to the benefit both of Government and of the other parties concerned. The possible objection on the score of considerably increased cost of the permanent cadre which this revision would involve is one which, I should think, could be easily met on the ground that there must be a much more serious loss to Government, at present, owing to so large a reliance upon a class of engineers which, though doubtless numbering some good officers is, as I understand, regarded by those who are competent to judge as being generally much less efficient that the permanent staff.

I may add here that the lowest number of Temporary Engineers sanctioned at any one time during the past six years was 55, the largest being 77. Were the permanent cadre to be enlarged, as I have suggested it should be possible, I think, to absorb the best of the Temporary Engineers now in the service, and the others should be got rid of gradually as the permanent cadre was worked up to. Acceptance of these suggestions would involve an increase of the permanent cadre much in excess of the figure at present under consideration, *viz.*, 200 which however has been arrived at on different considerations. I should think the permanent cadre should not be less than about 230, and might very probably be larger if the requirements were calculated as I have suggested.

80,846. **(II.) System of training and probation.**— Members of the Imperial Service appointed by the Secretary of State are as a rule trained engineers and are appointed permanently, but they are required to pass a departmental examination dealing with local methods of working, within three years of appointment, and an examination in the vernacular within two years of appointment, failing which their increments of pay are liable to be stopped. The system of training for engineers of the Provincial Service is as follows. Each year four qualified students of the Rurki College are posted to railways as apprentices for a year's practical training during which they are not counted against the cadre. At the end of this time two of the four students are appointed to the Provincial Service as Assistant Engineers, the selection being made according to their fitness for appointment. These engineers also have to pass the departmental examination. In the event of all four proving equally fit, selection is made according to the order of merit in passing out of College, the others being discharged with a certificate or given temporary employment.

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* The excess of 2 is due to over recruitment by the Secretary of State in anticipation of sanction to an increase of the cadre.

80,847. **(III.) Conditions of service.**—Recruits are appointed as Assistant Engineers, and under the time-scale of pay continue as such until the 11th year of service, when they pass to the rank of Executive Engineer if considered fit for the charge of a division. No officer in the executive class may draw more than the lowest pay of that class, except as a purely temporary arrangement, unless he actually holds a divisional charge, or a charge of equal importance. I understand that there is a movement for the abolition of this rule on the ground that it may cause a block in promotion. I am not aware of any serious block having occurred yet, but one appears to be probable in the future. Executive Engineers,* if not blocked, rise to the maximum pay of their class in the 20th year of service, and thereafter are eligible for promotion by selection to Administrative rank as Superintending Engineer and Chief Engineer. There are three classes of Superintending Engineers and two of Chief Engineers. Provincial Executive Engineers who are not promoted to the higher ranks are eligible for a special further increment of Rs. 50 after the completion of five years service on the ordinary maximum pay (Rs. 850) of this grade. Retirement is compulsory at the age of 55.

80,848. **(IV.) Conditions of salary.**—Until the year 1908 the Engineer Establishment on State Railways was divided into grades. But in 1908 the Secretary of State sanctioned the introduction of time-scales for the Imperial and Provincial Services, the latter scale being subsequently revised in 1912. The graded rates that existed in 1890 and 1900 and the time-scale rates that exist to-day for both Imperial and Provincial Services are given below for the purpose of comparison. (It is correct to say, as a general rule, that the Imperial or English appointed Engineers drew, and the Provincial or India appointed Engineers did not draw, Exchange Compensation Allowance; hence this allowance has been added in the Imperial columns under the heads 1890 and 1900. The allowance is not drawn now by either Imperial or Provincial Egineers on the time-scale):—

Class and Grades.	1890.		1900.	
	No Provincial Service Existed.		Imperial and Provincial Services with Different Rates of Pay Introduced.	
	English recruits (this is the same scale with) E. C. A. added.	Indian recruits.	Imperial (including E. C. A.).	Provincial.
	Rs. a. p.	Rs.	Rs. a. p.	Rs.
Assistant Engineers—				
3rd Grade ...	—	250	371 14 0	250
2nd „ ...	371 14 0	350	478 2 0	350
1st „ ...	531 4 0	500	584 6 0	400
Executive Engineers—				
4th Grade ...	637 8 0	600	—	—
3rd „ ...	743 12 0	700	743 12 0	475
2nd „ ...	850 0 0	800	903 2 0	550
1st „ ...	1,009 6 0	950	1,062 8 0	650
Superintending Engineers—				
3rd Class ...	1 168 12 0	1,100	1,168 12 0	750
2nd „ ...	1,434 6 0	1,350	1,434 6 0	900
1st „ ...	1,700 0 0	1,600	1,700 0 0	1,050
Chief Engineers—				
3rd Class ...	1,912 8 0	1,800	1,912 8 0	1,800
2nd „ ...	2,125 0 0	2,000	2,125 0 0	2,000
1st „ ...	2,638 14 3	2,500	2,638 14 3	2,500

Present time-scale—

Grade.	Year of Service (or Class).	Imperial Rates of Pay.	Provincial Rates of Pay.
		Rs.	Rs.
Assistant Engineer ...	1st	380	250
„ ...	2nd	420	275
„ ...	3rd	460	300
„ ...	4th	500	325
„	5th	540	350
„ ...	6th	580	375
„ ...	7th	620	400
„ ...	8th	660	425
„ ...	9th	700	450
„ ...	10th	750	475
Executive Engineer ...	11th	800	535
„ ...	12th	850	570
„ ...	13th	900	605
„ ...	14th	950	640
„ ...	15th	1,000	675
„ ...	16th	1,050	710
„ ...	17th	1,100	745
„ ...	18th	1,150	780
„ ...	19th	1,200	815
„ ...	20th and following years.	1,250	850
Superintending Engineer	3rd Class	1,500	1,200
„	2nd „	1,750	1,400
„	1st „	2,000	1,600
Chief Engineer ...	2nd „	2,500	2,500
„ ...	1st „	2,750	2,750

80,849. **(V.) Conditions of leave.**—These are laid down in part III of the Civil Service Regulations. Generally speaking civilian officers appointed in England come under the European Service Leave Rules. Other officers come under the less favourable rules known as the Indian Service Rules.

The maxima and minima long leave alowances for these officers are:—

Place of Payment.	Maximum.		Minimum.	
	Imperial.	Provincial.	Imperial.	Provincial.
Paid in India...	Rs. 667 per mensem.	Rs. 500 per mensem.	Rs. 167 per mensem.	Rs. 167 per mensem.
Paid in England.	£800 per annum.	£600 per annum.	£200 per annum.	£200 per annum.

The Imperial Civil Engineers have asked in a Memorial to the Secretary of State that the leave allowance sanctioned for the Indian Civil Service and Military Officers subject to the Civil Leave Rules be extended to them. These rules would benefit them chiefly in raising the long leave allowances as follows:—

	From	To
Maximum.		
Paid in India ...	Rs. 667	Rs. 833 per mensem.
Paid in England ...	£800	£1,000 per annum.
Minimum.		
Paid in India ...	Rs. 167	Rs. 417 per mensem.
Paid in England ...	£200	£500 per annum.

The feeling that there is an urgent case for a raising both of the minima and maxima long leave allowances is, I believe, very general, the grievance of engineers on this head being shared by most of the uncovenanted services. I am not aware of the precise request which the other services are making on this point but they are, I believe, pressing for some considerable improvement of the leave allowances. Personally, I think, that this grievance ranks for redress next after the case for a substantial improvement of the pension rules.

80,850. **(VI.) Conditions of pension.** — Both Imperial and Provincial Engineers are pensionable staff. The rules applicable to them are laid down in Part IV of the Civil Service Regulations and in Section II of Chapter XXX idem.

The following is a summary of the present rules regulating the pensions of Imperial Engineers:—

(1) Ordinary retiring pension after 20 years' qualifying service of one-half of the average emoluments of their last 3 years of service limited to (*a*) Rs.

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* *Vide* remarks in Mr. Ryan's oral examination (paragraph 80,925).

4,000 or £350 a year if service is not less than 20 years, and *(b)* Rs. 5,000 or £437·5 a year if service is not less than 25 years, *plus*

(2) *(a)* In the case of officers recruited not later than 1893 (*i*) **A** special additional pension of Rs. 1,000 *or* £87·5 **a** year to officers who have rendered **3** years' approved service as Superintending Engineer, and (*ii*) **A** special additional pension of Rs. 2,000 or $2175 a year to officers who have rendered *3* years' approved service as Chief Engineer.

(b) In the case of officers recruited later than 1898 a special additional pension of Rs. 1,000 or £87·5 a year to officers who have rendered not less than 3 years' service as Chief Engineer or Superintending Engineer, class **I**, provided further, in the case of officers appointed after 1909, that an officer who retires voluntarily cannot get the special pension unless he has rendered 28 years' qualifying service. To be eligible for this pension an officer's service must have been specially efficient.

(3) Retirement is compulsory on attaining the age of 55 years, but an officer who on reaching the age of 50 has not attained the rank of Superintending Engineer is liable to be called upon to retire.

The great majority of the officers of the Imperial Service have, however. asked for enhanced rates of pension in a memorial addressed to the Secretary of State which has been held over pending the consideration of the matter by the Public Services Commission. Sterling rates of pension are asked for *viz*:—

Ordinary Pensions.

				£
On completing	20	years' service	...	350
,,	21	,,	...	380
	22		...	410
,,	23	,,	...	440
,,	24	,,	...	470
,	25	,,	...	500
,,	26	,,	...	540
,,	27	,,	...	580
	28		...	620
				660

Special Service Pensions.

They also asked that an additional pension of £40 per year of completed service may be accorded to an officer who has risen to administrative grades subject to a maximum pension of £940 per annum. **A** final decision upon these memorials has been postponed in view of the appointment of the Royal Commission. I myself have a personal interest in the decision on this matter. I think that Government might reasonably be expected to improve considerably at least the pensions earned by twenty-five years' service and upwards, which are now entirely inadequate in the case of European officers who wish to live in their own country on retirement.

80,831. (VII.) Such limitations **as** may exist in the employment of non-Europeans and the working **of** the existing division of services into Imperial **and** Provincial.—As regards the first part of this question **it** will be noticed from the condition No. 5 of the regulations* as to appointment of Assistant Engineers, that under the existing rules Natives of India who have been educated in England and are otherwise eligible may be appointed to the Imperial Service, to the extent of 10 per cent. of the total number of Assistant Engineers recruited by the Secretary of State. This question has been the subject of discussion with the Secretary of State. The Government of India in 1911 proposed that the Secretary of State should discontinue appointing Indians to the Imperial Service from England and suggested that, instead, deserving engineers appointed in India and belonging to the Provincial Service should be eligible for transfer to the Imperial Service to the extent of 10 per cent. of the appointments of Assistant Engineers made in England by Secretary of State His Lordship, however, ,in a despatch dated 26th July 1912 was of opinion that this was **a** question for consideration by the Public Services Commission.

In the same despatch the Secretary of State pointed out that there were a large number of Indians who went to England for training but were unable to obtain employment to the Imperial Service. His Lordship accordingly asked whether it would be possible to appoint these and any others who may have been trained in India outside Engineering Colleges to the Provincial Establishment. The Government of India replied that there were several reasons against the adoption of such a practice, the most important considerations being 1st the small number of appointments already guaranteed to students of the Indian Colleges and 2nd that such a system would be **pre**judicial to the interests of the Indian Colleges, the prospects of the Upper Subordinate Establishment, and the general efficiency of the department. **If,** however, after considering these views and the recommendation of the Public Services Commission on the question the Secretary of State still wished **it**, the Government of India would in special cases appoint to the Provincial Service men who qualified outside the Indian Engineering Colleges and the Upper Subordinate Establishment.

For the relative number of Indians as compared with Europeans see the statement submitted.

The last Royal Commission on the Public Services reported in favour of a division of the Public **Works** Department (which at that time included railways) into provincial and into imperial services partly on the ground that some of the work requires men of higher qualifications than the rest. This argument possibly still holds good in the case of the Public Works Department, but, in my opinion, no reason for this division of the *Railway* Engineer staff into two services is to be found in the nature of the work. So far as **I** can judge, the whole of the engineering work on railways, whether in survey, construction, or maintenance, is such as to require staff of the highest qualifications.

80,852. (VIII.) Relations of the service with the Indian Civil Service and other services.—The Railway Department does not, like many of the Indian services, include any covenanted Indian Civil servants. and it has probably fewer direct relations with the Indian Civil Service than any other Department. (This observation is of general application to the whole of the Railway Services.)

(2) *SUPERIOR TRAFFIC DEPARTMENT.*

80,853. (**I.**) Methods of recruitments.—This department. is recruited from the following sources :—
(*a*) candidates appointed in England ; and
(*b*) candidates appointed in India ;
(*c*) Royal Engineers ;
(*d*) the Subordinate Traffic Establishment;
(*e*) the staff of other railways.

The rules approved by the Secretary of State under which recruits are obtained are submitted*. The Indian appointments are made by the Railway Board by selection of suitable candidates. In making these selections they are careful to insist upon high educational qualifications as well as upon other recommendations for appointment. It might possibly be well to prescribe by rule the minimum general educational standard below which applications for such appointments would not be considered.

80,854. **(II.)** System of training and probation, and **(III.)** Conditions of service.—These are touched on in the rules referred to above*. Retirement is compulsory at the age of 55 years. The present rules as to recruitment, training, and probation were framed only a short time back; it yet remains to be seen how the Indian recruits fulfil the expectations held as regards them. The recruitment **of** Indians in this country is a new departure and something of the nature of an experiment.

80,855. (IV.) Conditions of salary.—In July, 1889, the original incremental scale which was introduced in 1872 and which was altered at the suggestion of the Director of State Railways in 1874, was replaced by a scale of classes and grades on fixed pay corresponding to the rates of pay then in force for the Engineer Establishment. From July, 1889, to December, 1908, no change was made in the rates of pay. In December, 1908, a revised scale of pay for the administrative posts (Heads of Departments and their Deputies) in the Superior Revenue Establishment was sanctioned by the Secretary of State on account of the immense increase in the open mileage of railway that had gradually taken place during the past years, the enormous development of trade, and the growth of the competitive element in the working of traffic and consequently in tha increased responsibility of traffic officers. Under the revised scale the pay of Traffic Managers became Rs. 2,000 and that of Deputy Traffic Managers Rs. 1,500 per mensem.

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* *Vide* Appendix V.

* *Vide* Appendices **I and II.**

With effect from 1st April, 1911, the following revised scale of pay for the District and Assistant Superintendents was sanctioned by the Secretary of State on the recommendation of the Government of India.

District Superintendents.

	Rs.
Class II, grade 1	1,100
,, ,, 2	1,000
,, ,, 3	900
, ,, 4	800
,, ,, 5	700

Assistant Superintendents.

Class III, grade 1	550
,, ,, 2	**450**
,, ,, 3	400
,, ,, 4	300
,, 5	200—250

(No Exchange Compensation Allowance is given.)

The reasons for revising the scale were : —

(1) that an increase of pay for these officers was imperatively called for on account of the need for raising the capacity of the establishment by obtaining a better class of recruit;

(2) that the grant of an increase of pap was necessary to allay discontent in consequence of the rise in the cost of living, &c., &c., and the grant of higher rates of pay to members of the Engineer Establishment and other services of Government.

The above rates of pay do not apply to Royal Engineer officers serving in the Traffic Department. Such officers draw pay in the Assistant and District classes according to the scale which would be applicable to them if they were serving in the Engineering Department, while obtaining their promotion from grade to grade according to their positions in the list with their civil confrères. In the Administrative class the Royal Engineers are paid at the same rates as Civilian Traffic officers and this, I understand, is a subject of complaint since they are at a disadvantage here as compared with Royal Engineers in the Engineering branch.

Promotion from class to class in the Traffic Department depends on vacancies, but grade promotion is ordinarily given at intervals of two years. Promotion to the rank of Traffic Manager and Deputy Traffic Manager is made by selection. The rates of pay are perhaps sufficient for the lower grades, but the pay of Rs. 2,000 for the Traffic Manager is lower even than the pap given to officers of corresponding positions in England, and is, I think, inadequate. I believe there is a movement in favour of the introduction of a Rs. **1,250** grade in the district class. In this connexion I would refer to my remarks under head IX (paragraph 80,860) following.

80,856. (V.) Conditions of leave.—English recruits are subject from the outset to the European Service Leave Rules, Indian recruits to the Indian Service Leave Rules until they attain to pay of Rs. 800, when they come under the more favourable rules. The observations in paragraph 80,849 *ante* (Engineering Department) are generally applicable, and may be referred to. Royal Engineers in the Traffic Department retain their own more favourable leave rules.

80,857. **(VI.)** Conditions **of** pensions.—The Traffic Establishment is a non-pensionable one. Officers are required to subscribe to the Provident Fund of the Railways to which they are attached, *vide* the note at paragraph 80,921.

80,858. (VII.) Such limitation as may exist in the employment of non-Europeans and the working of the existing division of services into Imperial and Provincial.—The recruitment of Assistant Traffic Superintendents in England and India is in the proportion of three-fifths and two-fifths respectively if these proportions are found suitable. **No** fixed proportions are laid down except as a general guide.

The sanctioned scale is as under : —

Designation.	North-Western.	Eastern Bengal.	**Oudh** and Rohilkhand.	Total.
Traffic Managers	1	1	1	3
Deputy Traffic Managers	4	2	2	8
District Superintendents...	17	13	5	35
Assistant Superintendents	31	25	10	66
Totals	53	41	18	112

The Statement submitted* shows the number of Europeans, Anglo-Indians, Hindus, and Muhammadans at present employed in the Traffic Department.

There are no temporary appointments outside the sanctioned cadre.

80,869. **(VIII.)** Relations **of** the service with the Indian Civil Service and other services.—[See the note at paragraph 80,852.]

80,860. General remarks.—In making the preceding remarks I have assumed that no great departure will be made from the existing system of recruiting this department, but I think I should add that it appears to me that while the great importance of the Traffic Department in the Indian railway system is admitted, it is doubtful whether the existing scheme of recruitment will prove quite satisfactory. If the scheme which is being recommended for the re-establishment of an Indian Training College in England is approved, then I certainly think that the Traffic Department should be recruited from it. It is probable that the preliminary training in engineering would be of the greatest service to Traffic officers in their career *in* India.

(3) *LOCOMOTIVE* ***ASD*** *CARRIAGE AND WAGON ESTABLISHMENTS.*

80,861. (I.) **Method** of recruitment.—This Department is practically exclusively recruited **from** England. The method and conditions of appointment are given in Appendix **111.**

80,862. **(II.)** System of training and probation.—Qualified Mechanical Engineers are invariably appointed by the Secretary of State. The rules on the subject are in Appendix *III.* They are, I believe, satisfactory and no change seems to be necessary.

80,863. (III.) Conditions of service.—These are laid down in the rules (Appendix *III*).

80,864. (IV.) Conditions of salary.—The history of the establishment in this respect is the same as that of the Superior Traffic Establishment. The scales of pay and system of promotion are identical.

80,865. (V.) Condition of leave.—These are the same as applicable to Traffic officers. There is, I understand, in both Departments a strong feeling that the leave allowances admissible under the existing rules are insufficient.

80,866. (VI.) Conditions of pension.—The staff is non-pensionable. As to the provident fund see th4 note at paragraph 80,921.

80,867. (VII.) Such limitations as may exist in the employment **of** non-Europeans and the working **of the** existing division ***of*** service into Imperial **and Provincial.**—European recruits are invariably sent out by the India Office, and it is doubtful whether any Indian trained in England has ever been a candidate for appointment.

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* **Not** reprinted.

The sanctioned scale of appointments is :—

For the Locomotive Department.

Designation.	North-Western.	Eastern Bengal.	Oudh and Rohilkhand.	Total.
Locomotive Supcrintendents	1	1	1	3
Deputy Locomotive Superintendents.	2	2	—	4
District Locomotive Superintendents.	14	6	4	24
Assistant Locomotive Superintendents.	18	7	4	29
Totals	35	16	9	60

	1	1	2
		—	1
	5	2	7
		2	7
Superintendents.			
Total ... .., ...	12	5	17

in connexion with which the note at paragraph 80,921 may be read.

80,872. (IY.) Conditions of salary.—The original scale for the Superior Revenue Establishment (which besides Agency or Management includes all Departments except Engineering) was an incremental one on rates of pay varying from Rs. 250 to Rs. 1,200. In 1874 it was slightly altered at the suggestion of the Director of State Railways. In 1883 the scale was modified to correspond with the then rates of pay of the **Chief** and Superintending Engineer Establishment and the following rates were introduced for Managers and Deputy Managers :—

Railway.	Managers (maximum pay).	Deputy Managers.
	Rs.	Rs.
North-Western ..	2,500	1 on 1,350 1 on 1,100
Eastern Bengal ...	1,600 *plus* 250, special local allowance for residence in Calcutta.	1 on 1,100
Oudh and Rohilkhand	1,600	1 on 1,100

In 1902 in order to attract and retain the best men, the pay of Managers was assimilated to that of Chief Engineer, 1st Class, and the maximum for each of the three posts was fixed at Rs. 2,500.

Again in February, 1908, the rates were revised as follows :—

	Rs.
Managers, North-Western and Eastern Bengal Railways ...	3,000 each,
Manager, Oudh and Rohilkhand Railway	2,500 ,,
2 Deputy Managers (one for North-Western and the other for Eastern Bengal Railway)	1,750 ,,
2 Deputy Managers (one for North. Western and the other for Oudh and Rohilkhand Railway)	1,500 ,,

These rates are still in force.

50,873. (V.) Conditions of leave.—These follow the rules applicable to the service to which the officers belong.

80,874. (VI.) Conditions of pension.—Pensionable officers (*i.e.*, officers of the Engineer Establishment) serving in the Agency Department retain their *own* departmental pension rules. Three years' service as a Deputy Agent or Agent renders a Civil Engineer officer eligible for an additional pension of Rs. 1,000 or Rs. 2,000, respectively, in the case of officers appointed to the service before 1899.

80,876. (VII.) Such limitations as may exist in the employment of non-Europeans and the working of the existing divisions of services into Imperial and Provincial.—There are only seven appointments in the Agency Department as noted below :—

1 Agent, North-Western Railway.
1 ,, Eastern Bengal Railway.
1 ,, Oudh and Rohilkhand Railway.
2 Deputy Agents, North-Western Railway.
I Deputy Agent, Eastern Bengal Railway.
1 ,, Oudh and Rohilkhand Railway.

There is no division between Imperial and Provincial, and there is no limitation by rule in the employment of non-Europeans. All that is necessary is that an officer for appointment should be a specially good all round railway man. The present incumbents are Europeans and are all Engineer Officers; they comprise 5 Royal Engineers and 2 Civil Engineers.

80,876. (VIII.) Eelations of the service with the Indian Civil Service and other services.—[See the note at paragraph 80,852.]

(5) *SUPERIOR STORES ESTABLISHMENT.*

80,877. (I.) Method of recruitment, and (II.) System of training and probation.—Officers are appointed locally in India under the following arrangements :—

(1) Probationers of not more than 22 years of age, good education, and suitable social position are selected by the Railway Board, as occasion may arise,

to undergo a two years' course of training in the work of the Stores Department.

(2) They are appointed Assistant Storekeepers, on probation, on the non-pensionable establishment, on a salary of Rs. 150 or Rs. 200 per mensem for the first year of service.

Probationers who during the first year's service show aptitude for the work of the Stores Department, and prove satisfactory in other respects, receive a salary of Rs. 250 per mensem during the second year's service and on being reported by the Chief Storekeeper and the Agent of the railway on which they are employed, to be fully qualified to perform the duties required of them, are confirmed as Assistant Storekeepers upon a 3 years' agreement, the terms of which continue in force by mutual consent for the rest of their service.

(3) The Railway Board reserve to themselves the power to make appointments in India from the Superior Stores staff of companies railways, or other sources, on such rates of pay as the qualifications and experience of the candidates for employment may warrant, and to promote from the subordinate grades of the State Railway Establishment men of good character and education who have proved their fitness for advancement to the superior grades of the Stores Department.

80,878. (111.) Conditions of service.—The conditions of service for officers of the Stores Department are similar to those of Indian recruited staff in the Traffic Department. They are non-pensionable, but are subscribers to the Provident Fund; they come under the Indian Service Leave Rules until they attain the pay of Rs. 800 when they come under the European Service Leave Rules. Retirement at the age of *66* years is compulsory.

80,879. (IV.) Conditions of salary.—The scale of pay of this establishment, with the exception of the pay of Chief Storekeepers, corresponded from time to time with that in force in the Traffic and Locomotive Departments, prior to the introduction of the revised scale of pay of District and Assistant Office-s of those Departments from 1st April 1911. The present scale is reproduced below :—

Storekeepers.

		Rs.
Class II, grade	1	950
,, ,,	2	800
,, ,,	3	700
,, ,,	4	*GOO*

Assistant Storekeepers.

Class III, grade	1	500
,, ,,	2	400
,, ,,	3	350
,, ,,	4	210–250

The officers of the establishment, excepting Chief storekeepers, are eligible for Exchange Compensation Allowance.

The maximum pay attached to the appointment of a Chief Storekeeper was Rs. 950 till 1904 when the pay of Chief Storekeeper. North-Western Railway, was raised to Rs. 1,100. The pay of the other two Chief Storekeepers was also raised to Rs. 1,100 in 1908.

In August 1913 the pay of the Chief Storekeepers of the three State Railways was revised as follows :—

	Rs.
Chief Storekeeper, North-Western Railway...	1,500
Chief Storekeeper, Eastern Rengal Railway...	1,400
Chief Storekeeper, Ondh and Rohilkhand Railway	1,250

The sanctioned scale of appointment is :--

Designation.	North-Western.	Eastern Bengal.	Oudh and Rohilkhand.	Total.
Chief Storekeepers ...	1	1	1	3
Storekeepers	4	2	1	7
Assistant Storekeepers	3	3		8
Totals	8	6	4	18

80,880. (V.) Conditions of leave.—These are as stated under head III (paragraph 80,878), *ante.*

80,881. (VI.) Conditions of pension.—The staff are non-pensionable. Reference may be made to the note on the Provident Fund at paragraph 80,921.

80,882. (VII.) Such limitations as may exist in the employment of non-Europeans and the working of the existing division of services into Imperial and Provincial.—The Appendix submitted* shows the number of Europeans, Anglo-Indians and non-Europeans employed in this department, at present. The division is not regulated by rule.

For the rest I would refer to my remarks under head IX following.

80,883. (VIII.) Relations of the service with the Indian Civil Service and other services.—See in this connexion the note at paragraph 80,852.

80,884. (IX.) Any other points within the terms of reference to the Royal Commission not covered by the preceding heads.—The recent increase of pay of the Chief Storekeepers, referred to under head **IV** (paragraph 80,879) *ante,* was sanctioned **in** recognition of the importance of the charges and with the object of improving the prospects of the service, and thereby securing a better class of recruit. The importance of the work for which the Stores Department is responsible may be gauged by the following figures :—

Railway.	Total stores balance in charge of Stores Department on 31st December 1912.	chase of stores (Budget for 1913- 14).	Chief Storekeeper permensem.
	Rs.	Rs.	Rs.
North-Western ...	1,48,31,000	4,56,60,000	1,500
Eastern Bengal ...	56,84,000	1,38,77,000	1,400
Oudh and Rohilkhand.	26,62,000	1,13,71,000	1,250

It appears to me that there would be decided advantages to the State in the following radical alteration of the existing system of recruitment and payment. **I** would abolish the existing gazetted Stores Establishment as a separate list. The existing posts of Assistant Storekeepers might suitably be converted into superior subordinate posts, and be filled permanently either by promotion from the lower ranks, or by the local selection of competent men. For each necesssary higher post **I** would fix suitable liberal rates of pay, and instead of recruiting separately for this staff, **I** would transfer specially suitable members of the Engineer, or Locomotive, and Carriage and Wagon staff to fill the appointments. (The system mould be similar to that for recruiting the Agency Department.)

Such transfers might conveniently be made for **a** term of years, say 3 or 4; and, that officers so transferred might not be dissatisfied with the probably less congenial work of the Stores Department, **I** would as a rule so arrange selections for the posts that the transfers might be decidedly to their pecuniary advantage until such time as they might suitably revert to their regular line. This plan would have the great advantage of securing for the Stores Department officers of the best class and ability such as, **I** fear, are unlikely to be attracted by the inducements now held out by the present small self-contained cadre. Officers who have a practical knowledge of the use of the stores of which they are in charge could, **I** am sure, do much both to secure economy, and to reduce differences between the supplying and the consuming departments, while the practical experience of the working of the Stores Department which they could take back with them on reversion to their own Departments would further make for mutual understanding and easy working. **It** follows from the suggestion I have made that **I** have no proposals to make separately with regard to the employment of Indians in this department.

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* Not reprinted.

(6) *SUPERIOR SIGNAL ENGINEER ESTABLISHMENT.*

80,855. **(I.)** Method **of,** recruitment.—Prior to February 1909 the Signalling Establishment formed a part **of** the ordinary Engineer Establishment, but as the need for employing specialists became apparent, the Railway Board called upon the three Managers of State Railways to submit proposals for the creation *of* a separate Signalling Department. The result of a joint report was that a scale of Signal Engineers for the three State railways was sanctioned. As up-to-date knowledge of Railway signalling is essential the Signal Establishment is ordinarily recruited from Home.

80,886. **(II.)** System **of** training and probation.—Trained officers who have experience and knowledge of Signalling work **are** appointed by the Secretary of State. They are not appointed on probation.

80,887. **(III.)** Conditions **of** service.—Same as applicable to officers appointed by the Secretary of State to the Superior Traffic and Locomotive Departments.

80,888. (IV.) Conditions **of** salary.—The officers are paid according to their capacity and qualifications. They are ordinarily appointed by the Secretary of State on three-year covenants. On expiry of their covenanted period of service their further promotion is regulated by the following scale of pay:—

	Rs.
Junior Assistant Signal Engineer ...	400—600
Senior ,, ,, ,, ...	700—900
Signal Engineer	1,000—1,250

The officers are given increments in each class, of such amounts as are recommended by the Agent, and approved by the Railway Board, increments are ordinarily given each year. Promotions from class to class **are** made on the occurrence of vacancies.

80,889. (V.) Conditions of leave.—The same as those applicable to Traffic and Locomotive officers appointed from England.

80,890. (VI.) Conditions **of pension.**—This is a con-pensionable establishment? and the members of **it** are required to snbscribe to the State Railway Provident Fund, (*vide* note at paragraph 80,921.)

80,891. (VII.) Such limitations as may exist in the employment of non-Europeans and the working of the existing division **of** services into Imperial and Provincial.—There is only one Anglo-Indian in this establishment; the rest are all Europeans. The service is not divided into Iniperial and Provincial establishments.

The present scale is as follows:—

North-Westem and Oudh and Rohilkhand Railways.

1 Signal Engineer.
3 Senior Assistant Signal Engineers.
4 Junior Assistant Signal Engineers.

Eastern Bengal Railway.

1 Signal Engineer.
1 Junior Assistant Signal Engineer.

No addition to the present scale is at present contemplated. There is no officer appointed temporarily outside the sanctioned scale.

(7) *SUPERIOR ELECTRICAL ENGINEER ESTABMENT.*

80,892. **(I.)** Method *of* **recruitment.**—Recruits are obtained from England and from local candidates possessing English or American qualifications.

80,893. **(II.)** System **of** training and probation.—Trained officers are appointed to this establishment permanently.

80,894. **(III.)** Conditions *of* senice.—These are similar to those applicable to officers of the Superior Revenue Establishment, *e.g.*, Traffic and Locomotive and Carriage and Wagon Department. The appointments are borne on the Locomotive Department Cadre.

80.895. (IV.) Conditions **of** salary.—Ordinarily officers are appointed on the scale of pay applicable to the Superior Locomotive Establishment.

80,836.(V.) Conditions of leave.—The same as those mentioned under head V of the memorandum relating to the Traffic Department, paragraph 80,856.

80,897. (VI.) Conditions **of** pension.—This is a non-pensionable establishment, and the members are required to subscribe to the State Railway Provident Fund (see note at paragraph 80.921).

80,898. **(VII.)** Such limitations as may exist in the employment **of** non-Europeans and the working **of** the existing division **of** services into Imperial and Provincial.—There are at present only three appointments of this class, one on each line. All of them are filled by Europeans.

(8) *MINING ENGINEER AND METALLURGIST, STATE RAILWAYS.*

80,899. **(I,)Method of** recruitmen$.—This post was created in October 1910. Mr. R. W. Church, B.Sc., F.G.S., the incumbent of the post, was appointed in India by the Railway Board. He has English experience and training.

80,900. **(II.)** System *of* training and probation.—Trained officers only would, I presnme, be appointed permanently.

80,901. **(111.)** Conditions **of** service.—Those applicable to officers of the Superior Revenue Establishment of State Railways.

80,902. **(IY.)**Conditions **of** salary.—The pay *of* the post is Its. 900—50—1,500. The present incumbent draws Rs. 2,000 *plus* half fees for work undertaken for private concerns, and for work **paid *for*** from State controlled funds such as Port Trusts, etc.

80,903. **(V.)** Conditions of leave.—The present incumbent of the post is subject to the European Service Leave Rules.

80.904. **(VI.)** Conditions **of** pension.—The appointment is a non-pensionable one..

80,905. **(VII.)** Such limitations as may exist in the employment of non-Europeans and the working **of** the existing division **of** services into Imperial and Provincial.—Europeans only would, **I** imagine, he qualified for appointment to fill this post..

(9) *STATE RAILWAY COAL SUPERINTENDENTS.*

80,906. (I.) Method **of** recruitment.—There are no fixed rules. Officers are selected who possess first class English Mine Manager's certificate. Out **of** six officers, two mere sent out by the Secretary **of** State and the rest were recruited in India.

80,907. **(II.)** System *of* training and probation.—Only qualified men are recruited.

80,908. **(III.)** Conditions **of** service.—The conditions of service of officers appointed in India are applicable to Coal Superintendents except that. officers appointed from home are sent out by the Secretary of State on five gears' agreement. in the first instance.

80,909. **(IV.)** Conditions **of** salary.—The scale **of** this establishment with pay is as below:—

		Rs.
1	Coal Superintendent	950
1	Assistant Coal Superintendent	GOO-800
2	,, ,, Superintendents	600
2	,, ,, ,,	400-50-600

an additional appointment ın the lowest grade **will** probably be made shortly

80,910 **(V.)** Conditions **of** leave.—These **are** generally the same as in the Traffic Depaitment.

80,911. **(VI.) Condition of pension.**—The officers of this establishment are non-pensionable. and are required to subscribe to the State Railwav Provident Fund (*see* paragraph 80,921).

(10) *SUPERIOR MEDICAL ESTABLISHMENT.*

80,912. **(I.)**Method of **recruitment.**—This establishment consists of only two whole-time medical appointments, both on the Eastern Bengal Railway. One officer was appointed in India, and the other from home through the Secretary of State.

80,913. **(II.)** System **of** training **and** probation.—Only qualified officers are recruited.

80,914. **(111.)** Conditions of service.—So far the officers have been appointed in the nun-pensionable scale (*vide* the note at paragraph 80,921).

80,915. **(IV.)** Conditions of salary.—The salary of the medical officers are regulated according to their qualifications. No fixed rules are laid clown in this respect.

80,916. **(V.)** Conditions of leave.—As in head V. of the Traffic Department (paragraph 80,856).

80,917. **(VP.)** Conditions of pension.—This establishment is a non-pensionable one.

80,918. **(VII.)** Such limitations as may exist in the employment of non-Europeans and the working of the existing division into Imperial and Provincial.—There are only two appointments in this establishment, one of them is filled by an Anglo-Indian appointed in Europe, and the other by an Indian. At the present time the former is in receipt of Rs. 760 per mensem and the latter of Rs. 800 *plus* Rs. 150 as personal allowance. Both these appointments are on the Eastern Bengal Railway. There is also a temporary appointment on the Lower Ganges Bridge filled by a European officer appointed in India, who drams Rs. 1,100 a month.

80,919. **(VIII.)** Relations of the service with the Indian Civil Service and other services.—See the note at paragraph 80,952.

80,920. **(IX.)** Any other points within the terms of reference to the Royal Commission not covered by the preceding heads.—The Superior Medical duties on the other two State Railways, *viz.*, North Western arid Oudh and Rohilkhand Railways, are performed by Civil Surgeons who receive charge allowances fixed according to the number of employés who are entitled to attendance by them. The question of revising the arrangements on the Eastern Bengal Railway is at present under consideration.

11) *MEMORANDUM ON THE STATE RAILWAY PROVIDEST FUND.*

80,921. With the exception of the Engineer and Upper Subordinate Engineer Establishment the whole of the State Railway Services are now non-pensionable, the permanent staff being required to contribute to the Provident Fund of the particular railway on which they are employed as follows:—

Officers subscribe to the Fund at the uniform rate of one-twelfth of salary to which is added half-yearly the bonus noted below:—

(1) A first sum out of the gross revenue of the railway equal to one-half of such subscriptions;

(2) A second sum not exceeding one-half of such subscriptions; and also not exceeding 1 per cent. of net earnings, calculated before any contributions to the fund have been added to the working expenses.

(3) Interest at the rate of 3 per cent. per annum in the case of accounts kept in sterling and at 3¾ per cent. in the case of accounts kept on a rupee basis, is at present allowed on compulsory deposits and bonus, and at rates applicable to deposits in the Government Post Office Savings Bank on voluntary deposits. European and Eurasian subscribers will have the option, to be exercised within six months of joining the Fund, of having their accounts kept in sterling or in rupees. The Government reserves the right to vary the rate of interest allowed on compulsory deposits and bonus.

(4) The sum which thus accumulates to the credit of an officer is paid to him on quitting the service; **or,** in the event of his death before retirement, to his legal representatives.

It will be noticed that the bonus which is added by the Railway is limited by rule to a maximum of 100 per cent. and to a minimum of 75 per cent. of the subscriber's deposits; it has, in recent years, amounted, as a matter of fact, to—

Railway.	1912.		1911.		1910.		1909.		1908.	
	1st half.	2nd half.	1st half.	2nd half.	1st half.	2nd half.	1st half.	2nd half.	1st half.	2nd half.
North Western ..	100	100	100	100	88	100	96	99	86	75
Eastern Bengal ..	89	100	75	100	78	100	75	100	75	95
Ondh and Rohilkund.	100	100	100	99	100	84	75	87	89	75

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* Rot printed.

Mr. T. RYAN called and examined.

80,923. (*Chairman.*) The witness said that he entered the Service in 1898 and his experience had been to a large degree confined to the Accounts Branch of Railway work of State and Company Railways. The Superior personnel of the State Railways consisted of : the Agency establishment, Civil Engineers, Signal Engineers and Electrical Engineers (which were comparatively *a* small body), Traffic Department, Locomotive Department, Carriage and Wagon Department, Stores, **a** small number of Coal Officers, and a Superior Medical establishment consisting of two officers. The evidence he was prepared to give represented his own opinions and not necessarily those of the Railway Board.

80,924. The Agency Establishment consisted of three Managers and four Deputy Managers, all of them appointed by pure selection. Two of the Managers received the same rate of salary, Rs. 3,000 per mensem, as the Chief Engineers of the first grade holding the position of Secretaries to the Local Government: while the other received the pay, Rs. 2,300 per mensem, of Chief Engineer of the second grade; and the four Deputy Managers received the same pay, Rs. 1,750 and Rs. 1,500, as Superintending Engineers, second and third grade. Personally he was inclined to think that those rates were rather low both as compared with what men holding corresponding positions on Company lines in India received and with what he believed Managers of Railways received in England. The existing rates were sanctioned in 1908 and he did not think there was an actual case for recommending an increase at present, but it was possible Government would have to increase them before long.

80,925. With regard to Civil Engineers, the witness advocated an increase in the permanent cadre, improved pension, and the abolition of the division into Imperial and Provincial branches. He wished to qualify what he had said in his written statement (paragraph 80,847) to the extent of admitting that it was a little doubtful whether a man who was blocked for promotion above Rs. 800 per mensem in the Executive class would suffer throughout the rest of his Service. No case had actually arisen and he was not quite certain what the effect of the rules could be.

80,926. The sanctioned cadre of Engineers was 181 and a proposal to increase it to 200 was now before the Secretary of State. He thought it should be increased to about **230** or more, on the ground that it was insufficient and had to be supplemented by the continual employment of Temporary Engineers, who on the whole were men of an inferior class. During the last six years the number of Temporary Engineers had varied from 55 to *77*. The, number employed should depend only on the amount of money available for expenditure on railways, over and above an average programme. Last year the programme figure reached ten millions sterling, but it was impossible to say what should be taken as normal.

80,927. The witness considered it economically and administratively unsound to employ Temporary Engineers and really in effect to employ them permanently. With an increased cadre and the absorption of the Temporary Engineers, it would be possible, in **a** year when there was not much work to lend Engineers to companies and companies would only be too glad to have Government Engineers for any construction which they were carrying out; or, on the other hand, Government themselves could carry out the work at the expense of the companies as they had done and were now doing in some cases. The companies to which he referred were private companies which built feeder lines and had no, or a very small, permanent engineering staff. They employed **a** great number of temporary men and it would be to their benefit to get better men from the Government than the temporary men they employed now, and there would be no difficulty in getting the men back to the State lines when required.

80,928. The witness believed that if the cadre was re-cast and a proper number of the more important charges were allotted to Executive Engineers, there would be no block. At present the cadre had been gradually increased by Temporary Engineers, and many of the Assistant Engineers, so-called, were really doing very responsible work which would fully justify the employment of Executive Engineers. **If** the cadre was considered afresh on the grounds he had suggested it would be found to allow a reasonable flow of promotion with greatly increased efficiency. Any way he did not think it would be necessary to dispose of all the existing Temporary Engineers, but Government would probably employ the best of them.

80,929. The division into Imperial and Provincial branches had been recommended by the last Public Services Commission, partly on the ground that some of the work needed men of higher qualification than other work. All the work in railway service required men of the highest engineering skill, there being **no** distinct class of less important work. He suggested giving the same rates of pay to all officers in the Engineering Service, irrespective of whether they were non-domiciled or of the domiciled community, or Indians.

80.030. The witness stated that three-fifths of the Traffic Department was now recruited in England **and** two-fifths in India, the proportions being laid down not as an absolutely binding rule but as a general guide, and that process had been in operation within the last few years. Candidates for appointment in England to the department must have had two years' practical experience of Traffic work on a British or Colonial Railway or must have obtained a University Degree or **a** recognised Technical Diploma. The rules had not been in force very long and the total number of men appointed was not large, and his impression was that the University qualification was possessed by the major number. In India the only qualifications demanded were a good education and good social position. It would be a decided mistake to endeavour to get candidates in India who had had some experience of **a** Company line, because **a** man who was likely to do well on a Company line would have no incentive to join **a** State Railway, and only the less desirable men would usually be obtained. The conditions of service on a Company railway were quite **as** good as, if not, better than, those on a State Railway. It was rather doubtful whether the existing scheme **of** recruitment would prove satisfactory but it had hardly had a fair trial yet. The general impression seemed to be that the Traffic Department even now was not being recruited with men possessing the necessary qualifications, and he should like to make the standard of qualification more precise. If the proposal that was put before the Commission for the establishment of a Training College in England was adopted he thought it would be very desirable to get the Traffic men from it also, because a training in Engineering would be extremely useful to a Traffic Officer. There were large questions connected with the design of station yards and things of that kind in which the Traffic Department and Engineering Department were both very much interested, and he thought the general education of an Engineer helped a man in the Traffic Department. As a matter of fact some of the best Traffic Officers were recruited originally from the Engineering establishment, and a knowledge of the work of one Department closely connected with that of another was very useful. On Company lines it was not uncommon for a man to be transferred from one Department to another, but there was no systematic recruitment in that way.

80,931. On the subject of the recruitment of Royal Engineers to the Traffic Department, the witness said there was no fixed rule! but the Railway Department provided for fifty Royal Engineers to be employed as Engineers: in the Traffic Department, the Agency or Management, or the Locomotive and Carriage and Wagon Department. Mostly the men elected joined the Traffic Department and found their way into the Management. He did not consider they were necessary, but the system provided suitable occupation for *a* certain number of Military officers in time of peace and a training for military emergencies. Royal Engineers were appointed under rules designed to put them on the same level as Civilians of the same age, and he believed a complaint had been made that in a good many cases the Royal Engineer of a given age was receiving more pay and seniority than **a** Civilian of the same age, but probably that.

was accidental. If the rule did produce that result he thought, and he thought that Government would readily agree, that it should be altered. It was a source of dissatisfaction amongst some Civil Engineers.

80,932. The existing rules for the Traffic Branch provided for the promotion of subordinates in special cases, and he thought that option should always be retained in every Service. It had been done to a large extent in the past, and he thought about one a year was promoted.

80,933. The witness thought that if the system of nomination were efficient it would be a good plan to recruit for the Traffic Branch in England and in India by competitive examination amongst nominated candidates, successful candidates going through their probationary training in England. He would prefer, however, to see the whole recruitment from England, Indians of course being admitted, as he thought the English training mould be very valuable to the officers. If a probationary course were insisted upon in England his objection to the recruitment in India would be diminished, but he did not understand how an officer could be put through a probationary course in England. He certainly thought that any training in England was likely to produce more satisfactory results than a training in India only.

80,934. Dealing with the Locomotive and Wagon Department, the witness said that officers were selected from men who had had a mechanical training and experience of locomotive and wagon work. Most of the upper subordinate establishment in the Locomotive and Carriage and Wagon Department were Europeans or domiciled Europeans, some of whom no doubt would be fit for promotion; some had actually been promoted.

80,935. The witness said that the Stores Department was recruited entirely in India, the qualifications demanded being similar to those in the Traffic Department, It was not a very popular department and he did not think a very good type of officer was being obtained; applicants seemed to be more anxious to get into the Traffic Department. The pay was very small. He wished to see a better standard introduced into the Stores Department, and he had suggested a scheme for ten higher posts, the recruitment for which would be from Engineers and from the Locomotive Department. He considered that an Engineer would prove a satisfactory officer for the discharge of the work, and there would be no difficulty in finding among the Engineers a sufficient number of men perfectly suitable for dealing with stores, and the experience would be of advantage to an Engineer when he went back to the Engineering Department. The Stores Department required a radical change. The Railway Board reserved to itself the power of making direct appointments to the higher grades of the Stores Department by transfer from company railways or other sources, and at present there was one officiating Chief Storekeeper who had been transferred from the Locomotive Department. He did not think there had been appointments from other companies in recent years. Appointments from outside gave rise to dissatisfaction in the Stores department, but such dissatisfaction should be faced in the interests of Government.

80,936. With reference to the employment of Civil Surgeons on the Eastern Bengal Railway instead of the two Medical Officers at present employed, the witness said he thought it was not easy to apply the system to the Eastern Bengal Railway as there were fewer Civil Surgeons available near the railway line. The question had been considered and it was thought more convenient on the Eastern Bengal Railway to have whole-time Medical Officers, and he believed the system had been found satisfactory.

80,937. The witness thought that in the Superior Revenue Establishments the present graded system was not, in practice, very different from the incremental system now in force in other Services. Officers got their grade promotion regularly every two years. Class 2. for instance, was divided into five grades and in practice it worked out as an incremental scale, a man receiving his promotion biennially. He did not know that there would be any objection to making it an incremental scale out and out. At present there was no block between grades. So far as each class was concerned there was practically a time scale,. but it left a little wider discretion in making promotions. There was a bar between the classes, promotion from class to class being dependent on vacancies.

80,938. In his opinion a Traffic Manager would not be over-paid with Rs. 2,500, which was the salary a good many company-men received, but it would not be possible to give a Traffic Manager that sum on a State Railway unless the Agent were receiving more. Personally he thought the other rates of pay in the Revenue Department were fairly satisfactory.

80,939. The witness regarded as important the raising of the minimum and maximum furlough allowances.

80,940. For Engineers the witness suggested an improved pension at twenty-five years, and if that were conceded he thought the service ought to be prepared to forego the privilege of the option of retiring at twenty years. His personal feeling on that matter was very different from his official view. A great deal of stress was laid by officers upon the advantages of the twenty-year rule, but in practice not a very large number of them went at that period of service. His own feeling was that the Service would do well to give up the option of going before twenty-five years in consideration of getting a really sufficient pension afterwards. If an efficient man went after twenty years he naturally left because he could do better somewhere else, and that was not in the interests of the Service.

80,941. He was of opinion that the change from a pension to a State Railway Provident Fund was made mainly on the ground that the cost of the Provident Fund was charged off year by year, and that it was felt to be an advantage to have the staff on such a tenure of appointment as gave them no absolute right to be kept on permanently. A man belonging to a Provident Fund could be got rid of at any time, whereas a pensionable man was permanent. He thought it was important to retain that right in the interests of the Service, but as a matter of fact it was almost as difficult to get rid of a non-pensionable man as a pensionable one. In his opinion it was necessary to improve the Provident Fund, but he did not think the rate of interest was unreasonably low at 3¾ per cent. The raising of the interest would be one method of improving the Fund and another would be to abolish the restrictions which resulted in the Government bonus being frequently *less* than 200 per cent. of the deposits. In recent years the Government contributions varied from 75 to 100 per cent. in different half years. The State might reasonably make up 100 per cent. Temporary Engineers were eligible for the Fund in many cases, but he did not think Temporary Engineers should exist on the present footing. If purely Temporary Engineers were necessarily employed at times of unusual pressure he did not see why they should contribute to the Fund.

80,942. Private companies had Provident Funds which as a general rule were practically the same as that of the State Railways, but actual contributions varied on the different lines. The East Indian Railway Fund, he believed, always enabled a man to get cent. per cent. added to his deposits. The dissatisfaction with the Provident Fund was universal on Indian railways.

80,943. (*Lord Ronaldshay.*) The witness said that so far as he knew the only reason for recruiting Royal Engineers was to provide a reserve for the Army. 10 per cent. of the Imperial Service recruited in England was open to Indians under the present system. Personally, he did not believe there would be any advantage in recruiting the 10 per cent. in India instead of in England. It might be possible to raise the standard of the Indian educational establishments by recruiting Indians from Indian colleges, but he thought it would be at a cost of the efficiency of the railways. The witness wished to abolish the Provincial Service in the Engineering Department altogether and to recruit the Engineering Department solely in England, and if that were done it would not be necessary to limit the number of Indians to 10 per cent. He did not think as a matter of fact that more than 10 per cent. would be appointed, but if Indians proved themselves quite fit and had the necessary training in England he thought they should be admitted. He believed the great majority in the Provincial Branch of the Engineering Service were not Indians but domiciled Europeans or Anglo-Indians.

80,944. With reference to Temporary Engineers, looking simply at the money paid it was cheaper to employ them, but there was an indirect loss owing to the employment of inferior Engineers. The substitution of permanent for Temporary Engineers would be adding largely to the non-effective charges, but he considered that if a line was laid out badly there was *a* non-effective charge in perpetuity.

80,945. The witness said the recruitment to the Provincial Service was from qualified students from Rurki and by promotion of qualified subordinates. There was usually one promotion from subordinates in alternate years and two Provincial Engineers were now recruited annually. Four were taken provisionally and the two best retained. The selection of direct recruits was made on the result of the college examinations, and the Public Works Department and the Railway Department agreed as to the actual men to be appointed to the railways. A certain number. of appointments were guaranteed and given according to the position of candidates on the list.

80,946. As to the pay, there were two time scales, one for the Imperial Service and one for the Provincial. The Provincial Engineers, he believed, were usually not up to the same standard as the Imperial Engineers, and in practice they were given as far as possible the less responsible charges, but there were no actual charges specifically earmarked for Provincial Engineers. Nominally they did the same work. For promotion within the Assistant Engineer and Executive Engineer classes they were both on time scales. A man was promoted from Assistant to Executive Engineer on the time scale if there was a divisional charge in which he could be placed. and he did not think there was any discrimination between the Imperial and Provincial Branch in that matter.

80,947. In the Traffic Branch, the age limit for the recruits appointed in England was twenty-five and for those appointed in India 19 to 23. He did not know the reason for the difference except that the training exacted from the English recruit necessarily took time. Two years' practical experience was required or a degree or diploma after not less than three years' study. In the absence of any definite rules as to the educational standard and training in India, it was possible to take young men rather earlier in this country.

80,948. He thought the present rates of pay in the Traffic Department were adequate, but he believed the Department was dissatisfied at having no grade of Rs. 1,250. Europeans and Indians received the same pay and he did not consider that unreasonable: in all Departments if men were doing the same kind of work they should receive the same pay. He did not defend the existence of different scales of pay in the Engineering Department, but he agreed that the men who formed the majority, and must continue to form the majority, of the superior staff on railways should be paid sufficient to compensate them for service in a foreign country. There was something to be said from this point of view in favour of giving the Indian in his own country less, but he thought there were obvious objections to different rates. Discrimination might as well be made between the married man and the bachelor.

80,949. The Mining Engineering establishment consisted of one man, and the reason why his pay exceeded the authorised pay was because he was a man of exceptional qualifications and was considered worth the money, and because he would not stay otherwise. As it was a case of personal pay it was not worth while laying down a scale. The Mining Engineer received no fees nowadays for work done for either State worked or Company worked State Railways, the fees were contained in the Rs. 2,000. He received half the fees charged by Government to private concerns.

80,950. (*Sir Theodore Morison.*) With regard to the increase of the cadre by the absorption of temporary Engineers, he considered that when work was slack on Government railways employment might be found for them with companies. No doubt the slackness was often due to the Government not being able to find money, but the difficulty of finding money for Government railways did not prove that money might not be found for Company lines. It would pay Government to find money at 4 per cent. but they would not do so. By Company lines in this connexion he did not mean large main line companies controlled by Government but the smaller subsidiary Companies' building branch lines. He was certain there would always be plenty of work for Engineers. Branch lines, it was true, could not borrow money in times of serious financial crisis, but they could often borrow at a time when Government were spending rather limited sums. During famine there would perhaps be less work on branch lines but there would still be some. Those lines were really beginning to prosper now. The money with which the branch lines were made was to a large extent independent of the London money market, one of the chief objects being to promote the investment of Indian capital. The Branch lines influenced by the London money market were mostly the larger companies.

80,951. With reference to the Government assisting the Provident Fund, the witness recommended that that assistance should not be less than cent. per cent., but whether that would be adequate he was hardly in a position to say. The whole question was under expert examination at present, and until the results of the investigation were available he did not think a definite opinion could be formed.

80,952. As to the rates of pay of managers of company lines in India, the Agent of the Bengal and North-Western Railway received Rs. 2,750, of the Assam-Bengal Railway Rs. 2,500, of the Bombay, Baroda and Central India Railway Rs. 3,500, of the East Indian Railway Rs. 3,500, and of the Great Indian Peninsula Railway Rs. 3,500. There were no pensions but they contributed to the Provident Fund.

80,953. (*Mr. Chaubal.*) With regard to recruitment in India and in England, the Engineers for the Public Works Department and Railway Department, the witness believed, received their instruction at the same kind of institution in England, and from those a certain number was taken for Railway Engineers. An average Engineer so recruited no doubt could equally well be employed from the outset on the Public Works Department or on Railways. In certain Provinces Indians from local Engineering Colleges had to fill the posts of Executive Engineers, but he did not think it followed that if they had the necessary training they would do quite as good work as the European Railway Engineers, unless it was assumed that the building of roads, etc., required the same standard as Railway work. In England no special training was given for any special Department, the selection being made from applicants after they had had a certain amount of practical experience, and he understood they were allowed so far as possible to elect for the Service they wished to enter. The present recruitment from England involved no competitive examination, the recruits being selected from men who had certain definite educational qualifications.

80,954. Personally he thought it would be a mistake to rely on examinations only and he preferred a certain amount of selection. There were many things which could not be decided by examination but which were essential to the making of a good officer. It was rather difficult to define precisely what was generally required, but it was very much like choosing servants, looking at them and judging them by their appearance and manners, both which qualifications were of value to officerswho had to control a considerable staff. No doubt any system of selection or nomination introduced the risk of patronage.

80,955. The witness did not think that if Indian Engineering Colleges had a proper staff to give as good instruction as students received in England, and the students were given a probationary course of actual work on Indian Railways under experienced and efficient Engineers, it would thoroughly qualify them without going to England. For one thing it was impossible to see the best engineering work in India. Working under an experienced Railway Engineer in India for a year or so was of importance, but it was not such an experience as a man would gain in England. If the training were supplemented by a year's experience in England it would be a great improvement. Some training in England and preferably a college training would be a great advantage.

80,956. The witness believed the best means by which the proportion of Indians employed on the Railways could be increased without loss of efficiency, would be the re-establishment of Cooper's Hill College and the free admission of Indians to it. It would be Important that Indians who went there came from a class that were likely to turn out well for the kind of work they would have on railways. It might be advisable to give scholarships. It was necessary that the Engineering establishment should be technically trained. For the traffic establishment there was no training except actual work on Railways, but a training in an Engineering College would be extremely useful for a traffic man although it was not essential. The best training for the Stores Department was a practical knowledge of the uses the stores were put to, and for that it was necessary to have an Engineer or Locomotive or Carriage and Wagon man in charge, and Locomotive and Carriage and Wagon men should be trained as they were trained now by regular apprenticeship in large shops, actually doing the work of the men they would have to supervise. The Signal Engineers, Electrical Engineers and Mining Engineers were highly technical men and required special training. He did not think the ordinary Engineering course was necessary for a Locomotive man. The average time spent now in training Locomotive men was seven or eight years and they had therefore no time for a general Engineering course.

80,957. The witness promised to submit information to the Commission with regard to the increased cost when the time scale was introduced in 1908. At that time the pension rules were the same as now. The amount of pension was nominally based on the actual salary drawn.

80,958. (*Mr.* Sly.) In times of famine a great strain was put upon the Public Works Department in connection with the management of famine works and there was a great deal of expenditure on works such as earth works, which the ordinary Public Works Engineer could supervise. At that time a very heavy demand fell on the Government to provide a substantially increased Engineering staff, and he saw no reason why the Railway Engineers should not be utilised if they could be spared.

80,959. Many Assistant Engineers were holding Assistant's charges, but others were employed on work which would justify the employment of an Executive Engineer. The abolition of temporary Engineers would mean a large increase in the number of Assistant Engineers, and he thought if the matter was examined afresh it would be fouxd there was a real justification for an increase in the number of Executive and possibly Superintending charges. It would mean an increase in cost but there would be a corresponding increase in efficiency.

80,960. With reference to the Revenue Establishments the witness did not see how his proposals would involve any alteration in the cost of the Traffic Department as it was not necessary to pay the Traffic men the same as the Engineers. He did not see, however, why the Traffic Department should be any worse paid than Engineers.

80,961. With reference to the Engineer's time scale, the whole object of introducing a time scale of pay was to give an assured prospect within definite limits. If in the middle of the time scale there was the possibility of a block which might be in no way consequent upon a man's deficiencies he thought it would largely detract from the advantage of a time scale; if the effect of the block was permanent he thought it would be a much more serious thing.

80,962. The witness thought the proposal for study leave was a sound one.

80,963. As to pensions, there was a rule that there should be compulsory retirement at fifty-five, the rule being introduced to keep the service satisfied and efficient. He did not think the rule was introduced as a special matter at the time of a block of promotion in the Public Works Department. Personally, he believed the rule should apply to all services. With regard to pension being fixed in sterling instead of rupees, the claim was put forward by those who hoped to live in England when they retired, and so long as the exchange was stable there was not very much in the question.

80,964. Dealing with the Provincial Service, the witness said four candidates were taken each year from whom two were selected. The two rejected candidates he believed found work without much difficulty elsewhere on Company lines and in other branches of work. They had the advantage of having had a practical training and a certificate from the railway on which they had been working. In some cases he believed they had been employed as subordinates, but the Government was under no obligatioa to them.

80,965. The witness said he would submit a memorandum* to the Commission with regard to the proportion of Indians and of members of the domiciled community employed on Railways, at present and within the last few years. In the early years of the service the recruitment was almost wholly from the domiciled community. During the present year, in the Traffic Department, three appointments had been given to Indians out of a total of five, and in the previous year there were two out of three in the superior establishment; and he thought rather more than half were given to Indians in the Revenue Establishments generally. On Railways he thought there was a relatively larger number of Europeans and domiciled Europeans.

80,966. (Mr. *Macdonald.*) By Indians witness said he meant pure Asiatics.

80,967. Coal Superintendents were men who worked generally under the orders of the Mining Engineer at the colleries superintending the loading of coal for railway use.

80,968. With regard to the time scale, the witness said he had not expressed any decided views except that there was a certain amount of discontent in the Service at the present time.

80,969. With reference to pay, the Executive Engineer had heavier responsibilities than the Assistant Engineer, being a superior officer in reality as well as in name. There were cases in which Assistant Engineers had great responsibility, but generally speaking the Executive Engineer was superior to the Assistant. As a matter of fact broadly speaking the man doing less important work received less pay than the man doing the more important work, as the men doing less important work were on the lower rungs of the ladder.

80,970. With regard to the employment of temporary Engineers, the witness thought that any system which involved the appointment of a less competent staff to do important work was essentially unsound. No doubt temporary Engineers would claim that their responsibilities were the same as those of the permanent staff, and as a matter of fact they were *so* in many cases, though as a body they were inferior. The work of the temporary Engineers was less efficient than the work of the permanent Engineers, and he had no doubt that every engineering witness would support that statement though it might be denied by the temporary Engineers themselves. So far from the complaint being due to a certain section looking after its own interest, the witness thought it was entirely to the advantage of the permanent Engineers not to recommend the absorption of the temporary Engineers in the permanent cadre, and therefore he did not see how the permanent men could have any personal prejudioe. The only effect it could have on the permanent men would be to interefere with their promotion.

80,971. With regard to the Stores Department, the witness said there were at present three Storekeepers, one of whom was transferred from the Locomotive Department and had a practical knowledge of the use of materials, but the other two had never been employed in any branch but the Stores. They were responsible for the custody of very considerable Stores in the yards at headquarters and for the supervision of depôt Stores on the line. The Stores were bought to a large extent by the Storekeepers, who were not merely keepers but purchasers. The Storekeepers were controlled generally by the Agent of the Railway, but he had to a large extent to be guided by their representations. The Storekeeper knew what the normal consumption of Stores would be and he collated the requirements into statements which were approved of by the Agent. The oontracts were actually placed by Agents assisted by the Storekeeper, except in the case of coal, sleepers, and a few things of that character; also he had discretion up to certain limits to order stores himself without reference to the Agent. The power of the Storekeeper in purchasing was *so* important that it ought to be exercised by a man who had some practical knowledge of materials and the various articles required. He was assisted to a large extent by the expert advice of the consuming departments. But he was not thinking altogether of purchasing. An engineer might indent for a girder and an engineer in charge of the Store Department could then perhaps suggest the utilisation of something he had in stock. It was the business of the Storekeeper to keep down his balances and have his stock used rather than make fresh purchases. If the suggestion put forward was approved the Assistant Storekeeper would cease to be moved up, and he considered that then the appointment of Assistant Storekeeper would be filled by the promotion of suitable subordinates from the lower ranks. A subordinate who was able to rise to Rs. 400 or Rs. 500 would have nothing to complain of. There might of course be a difficulty with the existing staff. Under his proposal he thought Rs. 500 would be a sufficient maximum for Assistant Storekeepers promoted from subordinate ranks.

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* *Vide* Appendix IV.

80,972. (*Mr. Madge.*) The witness said he thought it might be ultimately possible to have Engineering works in this country which would be able to train first class engineers for the kind of work required in India, but that was a very long way ahead. He was not, however, speaking so much of the size of the works as the manner in which they were carried out. In England the entire staff was working intelligently and every man was probably an expert at his work, and a young man there would learn far more by observing how things were done than he would by any observation he could make in India, where things were done perhaps on the same scale but generally by a somewhat unintelligent subordinate staff.

80.973. With regard to the recommendation for the reservation of appointments to Indians, the witness thought it was quite probable that in such a recommendation the political aspect of the question predominated. He himself had known recommendations of that character that had involved loss of efficiency, and it had been recognised that efficiency was not the first consideration in the employment of Indians. The better class of Indians did not take to Locomotive and Carriage and Wagon engineering which involved a very arduous training in workshops and in subordinate capacities. He was not aware whether the domiciled Europeans and Anglo-Indians went to England to undergo a training, but he did not see why they should not turn out equally competent officers if they did so. He would not say that the best class of Indians did not undergo the training of an Engineer, but he doubted whether it was *a* suitable class. For an Engineer a man was required with an ancestry giving him the necessary instincts for mechanical work, and he thought that class was not the class which actually could afford to go to England and be trained as Engineers.

80,974. With regard to retaining the division between the Imperial and Provincial Services, the Provincial Engineering Service had not been very long in existence and he did not think many Provincial Engineers were yet in the running for the higher posts, such as Superintending Engineers, so that any complaint as to real merit not faring so well as it did before the division was somewhat premature.

80,975. The witness said he had no personal experience of the work of temporary Engineers, and the opinions he had put forward were formed mainly on conversations with his colleagues. On Company lines and State lines he had frequently heard temporary Engineers referred to as being decidedly inferior, with of course exceptions. That might arise from prejudice but it was an opinion he had formed during his fifteen years in India.

80,976. With reference to *a* remark that the system of medical arrangements was good but an individual selection bad, the witness thought it was quite obvious that an individual might prove himself entirely unsatisfactory without the system under which he was appointed being bad. He did not wish to exaggerate the matter, because there were only two whole-time superior Medical Officers in the Railway Department, one of whom was an Anglo-Indian and the other an Indian.

80,977. The witness considered it was a very difficult thing to form a definite opinion as to which was the better a Provident Fund or pension, and opinions varied very greatly. The pensionable man considered he would be much better off if he had a Provident Fund, while the Provident Fund man was of opinion that he would be better off with a pension. It seemed impossible to compare the two things and he had left them out of consideration in any opinion he had expressed as to the question of equating the emoluments of Company and State Railway Agents.

80,978. (*Mr. Abdur Rahim.*) The witness believed that the students at Rurki were admitted from all over India. The College in Bengal only provided for the upper subordinate establishment. There was an examination at Rurki and a certain number of appointments were guaranteed. He believed the training was very similar in its general outlines to the training at Cooper's Hill, which was chiefly theoretical with a certain amount of pretence at practical work. Towards the end of its time Cooper's men came out directly they left College, but during nearly the whole time the College was in existence there was a practical training in England and he believed its abolition was generally regretted by Engineers. There was an opinion favouring the re-introduction of an establishment on the lines of Cooper's Hill and he himself was in favour of it, but he thought it was improbable that it would come to anything. If such an institution were established he would recruit not only the Engineers but also the Traffic Officers from it. The recruitment from Cooper's Hill was on the results of examination only without selection, and the same system obtained at Rurki. There were six appointments guaranteed. Supposing there were eight who passed, numbers 1, 2, 7, and 8 might be allotted to Railways and if numbers 1 and *2* did good work during their year's training they were retained, but if the lower men did the better work they were retained and the others sent away. That system could not be applied to recruits from England. He thought all recruits should be on a genuine probation for at least a year. Up to the present he believed probation in most cases had been purely nominal, but he thought that should be avoided. Any man who was worth bringing out would have sufficient confidence enough in himself to face a probationary period. On the company lines he believed young men were brought out on probation but there also the tendency was to keep a man on, once he had been given a footing.

80,979. The witness considered that some exceptionally good men had been turned out at Rurki but those he had in mind were all turned out in the old days when there was no Provincial Service. Nowadays the attractions of the service were very much less, and it had been suggested that the same class of men were not attracted to Rurki now. If the distinction were abolished a better class of men would be attracted, but there would be still considerable need for recruiting from England. He did not think it was possible to give the same technical training at Rurki as in England though he was not competent to express a decided opinion about it. No doubt Professors could be obtained in India if sufficiently paid.

80,980. The witness said that the leave rules on company lines were slightly more favourable than on State lines and altogether he thought the conditions of service were more favourable on Company lines as a whole. The companies paid their top man better than the State. The men were non-pensionable and nominally could be sent away at any time, but in practice they were permanent servants. Ordinarily he believed they were employed on a three years' agreement and afterwards remained on subject to something like three to six months' notice.

80,981. The witness did not think it would be possible to do away with temporary Engineers altogether as there were occasions when it was necessary temporarily to increase the staff.

80,982. With regard to Rule 5 of the Regulations as to the appointment of Assistant Engineers, that

Natives of India were eligible for appointment and should be selected to the extent of 10 per cent. of the total number of Assistant Engineers recruited, the witness said the 10 per cent. was supposed to be a maximum but in practice it was taken as a rule. He did not think there was any justification for an arbitrary rule of 10 per cent. or any percentage, as the Railways were essentially a commercial business and the great thing was to get a competent staff, and that was the only principle he should apply. If men of the proper standard could be obtained by recruitment in India that method should certainly be adopted. but he did not think it could be done. Given a training in England he did not see why suitable Indians should not be admitted. Selection should come in at some stage, either before or after the examination. He was not wedded to the idea of a competitive examination.

80.983. As to practical training, the rule provided that if a man had not had a sufficient practical training at home he should be on probation in India, and there were some such men in the country. He mentioned a case of an officer who came out in the Locomotive Department on a three year covenant and was sent away at the end. That was the only case he could recall.

80.984. *(Sir Valentine Chirol.)* The witness said he would qualify the remark as to Railways being a business concern by adding that they were also a necessary factor in maintaining the security of the country both from a military point of view and from the point of view of internal security, and that had to be taken into consideration in dealing with the recruitment of the staff. He thought, however, that a staff which could be relied on for the safe working of the Railways should be adequate also from the military point of view. In fact the question of more immediate importance was the safety of the public, and this necessitated a very large reliance for the present upon European officers

80,985. As to the relative value of the permanent and temporary engineers, the witness said the remuneration of temporary engineers varied from Rs. 250 to about Rs. 600 and there were one or two exceptional cases where they got more pay. If the temporary engineers were as efficient as the permanent engineers he did not think they would give their services on such very much lower terms.

80,986. (*Sir Murray Hammick.*) The witness said the only reason he could give for Rurki College having the monopoly of supplying the Provincial Engineer to the Railway was the necessity of concentrating in one College owing to the number recruited being comparatively small. Rurki he thought had classes for Upper Subordinates and Provincial Engineers, who had a separate training. There was a regular College course and examinations were held at intervals and the men were ultimately appointed to the Provincial Service in the order of seniority. Only those candidates who had gone through the class at Rurki were allowed to come into the Provincial Service and some of them were appointed to the Railways. The witness said he was not in a position to give much information on the subject of other Colleges, but his impression was that they trained only for subordinate services. If he was wrong he should prefer to submit a supplementary note on the subject. He would not have any system in India for recruitment from Rurki to the Upper Service, as used to be the case before 1871, but he would always keep the door open for promotion in exceptional cases from the Subordinate Service It might have a very deleterious effect on the Engineering Colleges in India if the whole of the Indians were admitted to the Upper Service in England, but he was looking at the matter from the point of view of the railways.

(The witness withdrew.)

W. A. Johns, Esq., c.i.e., Chief Engineer, Oudh and Rohilkhand Railway.

Written Statement relating to the Railway Department.

80,987. I, as representing the State Railway Imperial Engineers (recruited from Cooper's Hill), while accepting generally the Written Statement* already submitted to the Royal Commission on the Public Services in India by the Civil Engineers' Association, desire to lay stress on certain points referred to in that memorandum and to amplify it in regard to certain matters which particularly affect Railway Engineers.

80,988. **(I.) Methods of recruitment** (*para.* 1 *of Written Statement* of *Civil Engineers' Association*).*—I consider that the re-establishment of such a College would become a practicable proposition if it were arranged to make it the main recruiting centre for all Departments of State Railways as well as for Telegraphs. In the event of its re-establishment, it would provide the most satisfactory method of entrance into the Department for all Europeans and Indians, other than Royal Engineers, wishing to serve on Railways. All who enter should be guaranteed appointments in order to attract the best men.

80,989. **(II.) Systems** of **training and probation** (*para.* 2 of *Written Statement of Civil Engineers' Association*).*—Whether a College is re-established or not, it should be laid down for Imperial Engineer recruits to Railways that they should have one year's practical experience on Railway Construction in England. I am strongly in favour of a probationary period in India. Care should be exercised in placing recruits under suitable officers and on suitable work, and if well reported on after one year's service they should be confirmed. If not well reported on, there should be another year's probation under a selected man, and if the report is again unfavourable, that recruit's services should be dispensed with; but if the second report is favourable, then a third year's probation may be insisted on.

80,990. **(III.) Conditions of service** (*para.* 3 of *Written Statement of Civil Engineers' Association*).*—With regard to the employment of Temporary Engineers, which is acknowledged to be unsatisfactory, I consider that there would be a decided advantage to the State in the gradual abolition of the Temporary Engineers and in a larger recruitment of Permanent Engineers, provided that such recruitment is counteracted by elimination of unsuitable men after probation, and provided there is proper selection for promotion to the Executive Engineer Grade. In this connection, it may be pointed out that in spite of the enormous increase in Capital expenditure on open lines, there has been no corresponding increase in the number of appointments to Executive Engineers and higher ranks. The advantages of employing Permanent Engineers to the exclusion of temporary men are,—

(a) When Government can finance a large programme, there is work for all on construction, and things are better done by permanent and responsible servants.

(b) When Government cannot do so, the surplus can suitably be employed on building such Railways as Government has allowed to be constructed by private promoters, to be worked by or on behalf of the State at a fixed proportion of the gross receipts. This system will prevent blocks in promotion on the Government list, and will thus benefit the staff and render the service more attractive, while at the same time, both Government and promoters reap the benefit of having the construction carried out by reliable, efficient and responsible Engineers.

The inferior prospects of the Provincial Service do not attract the same standard of candidates as were formerly attracted to the Imperial Service when appointments to this service were obtainable through Roorkee.

80,991. **(IV.) Conditions of** salary.—In connection with the question of starting salary. I would remark that at the time of the founding of Cooper's Hill in 1871, it was held by the then Secretary of State that £420 per annum was a suitable starting salary for attracting the best Engineers to India; owing to the depreciation of the rupee, this has never been worked to, since the first one or two years, and, although improvements made in the scale of pay five years ago have been some compensation for the increased cost of living, I do not think that anything has occurred since 1871 to justify a lower starting pay than was then considered to be essential. This is borne out by evidence given before the Committees of enquiry into the affairs of Cooper's Hill College, in which it was admitted that the earlier men, *i.e.*, the men who entered the Department with the better prospects, were superior on the average to those of subsequent years.

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* *Vide* the **evidence** relating to the Public **Works** Department taken in Calcutta, Volume XVI, paragraphs 72,155-63.

I consider that the proper way to avoid the difficulty referred to in sub-para. (i) of this section of the Civil Engineers' Association Written Statement* is to exercise more selection in promoting men to the rank of Executive Engineer.

The second, third and fifth clauses of sub-para. (ii) of this section do not apply to Railway Engineers, but in amplification of the 4th clause of this paragraph, I would urge that, although it is the practice that the post of Engineer-in-Chief of the North Western Railway carries with it the rank of a Chief Engineer, nothing is laid down for the Engineers-in-Chief of the Eastern Bengal State Railway and the Oudh and Rohilkhand State Railway, who draw simply the pay of their rank. It is suggested that it would be only fair to the officers holding these important positions, who are responsible to Government for the judicious expenditure of very large sums of money, to lay down that the minimum pay of each of these posts should be Rs. 2,000 per month. The principle has been accepted by Government lately in the case of the Examiners of Accounts of State Railways.

80,992. (V.) Conditions of leave, and (VI.) Conditions of pension.—I have nothing to add to what is represented in the Civil Engineers' Association 'Written Statements" under these heads, except to emphasize the fact that it is under these that all Imperial Engineers feel that they have a most genuine and serious grievance. To the penultimate clause of section (VI.) however, I should like to add that the question of a Family Pension Fund is considered by many Imperial Engineers on Railways to be one of great importance to the service. A scheme has been worked out, the rough idea of which has been explained to me, under which it is proposed that an officer should decide within a year of his marriage whether he would like to receive the whole of his pension in his own name, as if he were a bachelor, or to divide it equally with his wife, the half payable to his wife being paid to her during her lifetime from the date of the officer's retirement, or death, if earlier. The scheme is understood to have been drawn up with expert, assistance on a strictly actuarial basis, so as not to cost Government any more than the ordinary pension. This concession, which would cost *Government* nothing, would be considered a very valuable one.

80,093. (VII.) Such limitations as may exist in the employment of non-Europeans and the working of the existing division of services into Imperial and Provincial.—While it is granted that the inhabitants of' a country should have the fullest opportunity of filling the highest posts in the administration, it is very exceptional to find an Indian who is fit to occupy an administrative post as an Engineer, in fact I can only quote one instance of an Indian Officer who has been so qualified. As Assistant Engineers on Railways, Indians sometimes do very well, as Executives they are rarely a success, and I do not know of any Indians who are at present qualified for promotion to Superintending Engineer's rank. On Railways worked by Companies it is very exceptional to employ an Indian as an Engineer, *e.g.*, on the Bengal and North Western Railway there is not a single one out of a total of 35; on the Bengal-Nagpur Railway, only one out of 66; on the Bombay, Baroda and Central Indian Railway, three out of 58; on the East Indian Railway, one out of 45; on the Great Indian Peninsular Railway, four out of 91; these being all Assistants only and some of them temporary. In the 10 principal Companies' lines, out of 437 Engineers, only 11 are Indians. Native States almost invariably appoint Europeans to supervise their Railways. At the present time, European Officers are in charge of Railway work in Gwalior, Mysore, Hyderabad, Bhavnagar, Gondal, Jodhpur-Bikanir, Jaipur, Kotah, Oodeypur, Patiala, Jamnagar, Baroda and Bharatpur. There appear to be two reasons for this:—

(*a*) That the Engineering talent, is less strongly developed up to date among Indians than their other abilities; and

(*b*) That hitherto the work of a Railway Engineer has been regarded as being of rather a manual and inferior character, a trade rather than a profession, and hence unattractive to an Indian gentleman. The remedy which I would adopt has already been indicated, and lies in a training in England, *vide* paragraph 80,988.

The Provincial service is composed of Indians, Anglo-Indians and Europeans educated in this country, and usually of a less liberal education than the Imperial Engineers. Provincial Engineers on State Railways will only in very rare cases ever be promoted to Superintending Engineers. The class of man is not as a rule fit for an Administrative post on a Railway. Very few of them are even fit to be put in charge of *a* Division on a Railway. Openings must, however, be found for this class of men, and the Provincial Service is quite suitable, but I do not consider that they should be employed on Railways. There is plenty of Engineering work in India on Roads, District Boards, &c., for which these men are qualified

80,994. (VIII.) Relations of the service with the Indian Civil Service and other services.—At the time of the establishment of the R.I.E. College, Cooper's Hill, the Secretary of State announced in Parliament that he was inaugurating a great service on *a* par with the great Civil and Military Services. I consider that this object can never be fully attained until Railways are represented both on the Viceroy's and on *the* Secretary of State's Executive Councils.

Mr. W. A. Johns called and examined.

80,993. (*Chairman*) The witness said he had been elected as one of the three representatives of the Imperial Engineers employed on State Railways. He had had over thirty-three years in the Service. The Civil Engineers' Association embraced quite three-fourths of the Imperial Engineers, admitting everyone in the Imperial Service who subscribed a small annual subscription, both Indians and Europeans. The reason why one-fourth of the Engineers did not belong to the Association was that at one time there was a subscription and so men dropped out. while others did not join because they were too indolent or for *a* variety of reasons.

80,996 With reference to recruitment and training, the witness said he was in favour of the re-establishment of a college on the model of Cooper's Hill. No doubt technical education had greatly extended since 1871, but he thought the necessity of such a college was still as great. There was *a* valuable educational advantage in having all the men educated in the same place. The main thing was to get men collected together who were anxious to serve in India and not to have a body of men who, having completed a course, took up work in India just as they might take it up in any other country. When Cooper's Hill was started there were no institutions for teaching Engineering such as those which now existed in Glasgow and Manchester, &c. The teaching in those colleges was very good, but each university thought its curriculum better than its neighbour's, and it was hard for an outsider like himself to express any opinion on their relative merits. In witness's opinion the abolition of Cooper's Hill was a serious mistake, and he believed there was a strong opinion in both Houses of Parliament at the time that it was a pity to throw away a good thing. The witness's actual experience of men who had come out under the new rules was small, but there was no doubt that some of them were quite good. It was necessary, however, to think of the average in India as the wastage was very great, and he thought a central college would give a better average than could be obtained in any other way. He could not say there had been any definite deterioration, but he thought the average was not as good as it had been previously.

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* *Vide* the evidence relating to the Public Works Department, Volume XVI, paragraphs 72,155–63.

80,997. With reference to training, the witness believed that the great bulk of officers have had practical experience of railway construction in England and all the Cooper's Hill men had that experience. There was an intermediate stage when this practical course ceased owing to the cost. The men at that time were drawing £150 *a* year and *a* bonus if they did well, and for forty[*] students the cost was something like £8,000. He looked upon it, however, as the most valuable year of his life, following as it did the theoretical training. There was no real difficulty in making arrangements for such **a** training, *as* Railways in England were only too glad to take men at the request of the Secretary of State. During his own practical course he was on two different lines, and he apprehended that the best railways in England would admit. candidates and give them a full training, especially in new construction. English railways in their method of recruitment went in largely for the system of apprenticeship, men signing articles for five years and paying a premium. If a vacancy occurred at the end of their time they received permanent employment.

80,998. The witness was of opinion that there was not. as extended a field for railway construction in England to-day as there was in India, but the work there was done in better style. The workmen in England were much better and set a higher standard, but the field for such things as bridges, mountain railways, &c. was much wider in India than in any place in the world.

80,999. With regard to Indian Engineers, the witness said he thought Engineering talent was less strongly developed at the present time among Indians than other talents, and he also thought Engineering presented no ,attraction to Indians, but that he did not include all Statutory Natives of India in these remarks. He did not consider the training given at Rurki was comparable with the training that could be given in institutions in England. Rurki had undoubtedly turned out some very distinguished Engineers, most of whom had had their whole training at Rurki, though some went to England for certain additional training. The witness certainly believed that Rurki College could be made comparable to any college in the world, but he looked to training in England and an education which did not consist solely of lectures. He was afraid the theoretical training at Rurki could not be supplemented with practical teaching in India. He looked upon England itself as being the first part of the education, practice the second part, and college lectures the third part. It was the practical side that was inferior in India. He recognised a very definite inferiority in the standard of Engineering in India compared with the standard in England, and he thought it would be impossible to institute a college in India to turn out men who would not need to go to England.

81,000. With regard to the employment of Indians on railways, the witness said they were very useful as assistants as a link between the Executive Engineer and the contractor or ganger who was carrying out the work. As regards the Provincial Service generally, the present position of having two sets of men with different educational qualifications doing the same work and getting different pay was quite impossible. He thought the Provincial Engineer should disappear from State Railways entirely. He did not think it was ever intended by the Lyall Committee that Provincial Engineers should be appointed to railways at all. He wished to see all Executive posts on Railways removed from the Provincial Service.

81,001. With regard to the proportion of Natives of India in the Railway Service, the witness said he would like to see an opportunity given to Natives of India to enter the one Service in numbers corresponding to the number now in the two Services. It was extremely important that Indians should be educated at Home on railways, because on the railways in India they had to control a mixed staff of Europeans, Indians, and Anglo-Indians, and without *a* considerable training in England they would not effectively control Europeans here. Therefore only Indians educated in England should be recruited into the Superior Service. He did not think that would cause any injury to the existing colleges as there was a good deal of Engineering to be done in India quite apart from Railway Engineering. The percentage of Indians that should come in through the English door could be increased considerably and might be raised to 20 per cent. As to whether that number of Indians would find it convenient to go to England, witness pointed out that they went now to become Barristers in very large numbers, and he had not the slightest doubt that they would go to become Engineers in quite as large numbers as the railways could absorb.

81,002. On the question of leave and pension, the witness agreed generally with the statement of the Engineers' Association, but with regard to pay he thought the difficulty in connection with the block on the time-scale at Rs. 800 *a* month would be obviated by exercising strict selection. If selection from Assistant Engineer to Executive Engineer were exercised it would be a perfectly fair position that *a* man did not get any more pay until he got his division. Now if a man got to the top of his Assistant time-scale he did not go on until he obtained an appointment to a divisional charge; before he could get any further promotion on his time-scale he had to be in charge of a division, which comprised several Assistant Engineers. Those appointments went by seniority and he did not think they should.

81,003. Selection at that point would obviate the grievance now existing that **a** man getting Rs. 800 was blocked for the charge of *a* division because another man inferior to him but a year older was holding a division. Having been selected for promotion they would enter the time-scale in the new grade. He entirely concurred with the recommendation that the pay of the Chief Engineers should be raised to Rs. 3,000. In the last three years Railway Engineers had lost three Secretariat appointments carrying an allowance of Rs. **250,** which appointments had disappeared owing to reorganisation.

81,004. He thought it was an excellent idea that a certain amount of furlough should be commuted in order to obtain a shorter period on full pay. The only person[*] it would be likely to hit would be the delicate man who did not always want to go on medical certificate, but it would suit the more or less healthy person admirably and would be extremely popular. There was a very strong opinion among junior men in the Department in favour of being allowed to go to England for six months at any rate after three or four years' service, but at present a man could not take any form of long leave until eight years had elapsed.

81,005. (*Sir Murray Hammick.*) The witness said he had had one or two probationers from Rurki, and it was arranged for them to have their practical training without any transfer or change. It was essential to keep men on probation under one officer and to give them some interesting form of work, preferably railway construction, because open line work was too difficult for a young man and was very dull. He thought the Government could make the probationary period a real probationary period and they could impose *a* strict condition that before confirmation *a* man should be reported upon as absolutely fit for his duties. Return passages should be paid in cases when probationers from England were not confirmed.

81,006. With reference to the question of abolishing temporary Engineers and increasing the cadre of the permanent Engineers, the witness said he did not apprehend there would be times when it would be difficult to employ all the men. With the twelve million sterling programme there would be plenty of work for all, and there was a busy time coming which would last for many years. Expenditure of late had been largely confined to open lines, but there would be an enormous extension of railway construction work now that the open lines were brought up to an improved standard.

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[*] Only about one-fourth **of** these **would** be railway men.

[*] Mr. Johns afterwards wrote that on reconsideration it seemed to him that even the delicate man need not be adversely affected for he could take, say, a year on full pay and another without pay

81,007. The witness thought that outside the railways there was an opening for Provincial men not only in the Public Works Department, but in the building of mills and workshops which were springing up all over India. He thought Railway Engineering was on quite a different plane from the Engineering that dealt with the making of roads and construction of buildings, and these branches of the Public Works Department could be better worked by Provincial establishments than could the State Railways.

81,008. (*Mr. Abdur Rahim.*) The witness considered that temporary Engineers employed for constructing main lines should not be employed in maintaining them, but a few of the better men might be absorbed; the cadre, however, should be extended apart from any question of temporary Engineers. The maintenance of an open line did not require the same number of men per mile as construction, but the work was equally difficult although of a different kind.

81,009. With regard to Indians acting as Engineers in Administrative posts, the witness said the Engineer-in-Chief of the Eastern Bengal Railway at present was an Indian but he was quite an exception. Many had been tried as Executive Engineers and their work was not on a par with the English-trained Engineer. The number had not been very great but it had been sufficient to drew an inference of value. He recognised the distinct superiority in certain cases of Indian Engineers trained in England. In Native States he thought there were very few Executive Engineers on the railways whether Europeans or Indians. Until recently Indians were not very anxious for Engineering work. Railway Engineering especially was a form of service which took men away from their homes and probably that was one of the important reasons why Indians did not care for railway work. There was no possible objection to having 20 per cent. of Indians, but he would shut the door at that point, though he would not limit the number of those who competed at an entrance competitive examination (to the Central College in England).

81,010. (*Mr. Madge.*) The witness said he had seen work that had been done by Rurki Engineers before the division into Imperial and Provincial Branches took place, but he was unable to say how the work then done compared with the work that had been done since.

81,011. With regard to the present system of recruitment by the Secretary of State, the recruitment for ordinary Engineers did not differ from that for Railway Engineers. The selection committee, he presumed, took a man with a year's experience on Railways and sent him out to Railways, and a man with a year's practical experience of Water Works was sent to Irrigation work. There was no doubt a difference in the education of Railway Engineers and other Engineers, and he thought it was highly desirable there should be. Anglo-Indians and domiciled Europeans took to Engineering quite readily, but Indians in his experience were averse to Engineering.

81,012. (*Mr. Macdonald.*) The witness said the theory was that Temporary Engineers were appointed for a certain piece of work and were appointed from year to year, but on the North-Western Railway there were at present eighteen Temporary Engineers holding what might be termed cadre appointments on the open line. As a general rule their pay was considerably less than the men on the regular cadre. He thought the cause of it was that the Railway cadre of late years had become steadily depleted until it was unable to fulfil its requirements, and pending some general scheme for increasing the staff which he understood was being considered, the Railways were getting on as best they could. It was not because they were trying to do work cheaply. The pay of the Temporary Engineers was not increased because they were worth no more, and they were not discharged and better men taken on in their place at increased pay because it took a long time to have a cadre revised. Asked why these cheap inferior Temporary men were not got rid of and better men engaged on higher pay, the witness replied that the better men did not exist. In his belief they had the best Temporary Engineers that could be obtained for any pay, even for cadre pay. Temporary Engineers were recruited from all directions. Sometimes they came out to India on a particular piece of work and when that work was finished they obtained employment on the Railway. Sometimes they were men who had failed to get employment from Rurki. They were a very miscellaneous body. The arrangements made for increases in pay of Temporary Engineers were irregular. Speaking as an Engineer he thought the conditions of their Service were very bad.

81,013. (*Mr. Sly.*) The witness said that under the existing system, when a man reached the top grade of the Assistant Engineer's pay, he would have to remain there until he obtained a division or district, and all that time he would be an Assistant Engineer and would cease to get any further increase of pay. There might be many people so situated. Promotion by selection got rid of that to a great extent, because the less efficient person remained an Assistant and the man worth promoting was promoted. It was a rule that nobody should be promoted to Executive Engineer unless he was specially reported upon as duly qualified to hold a divisional charge, but some men were better than others. What he wanted was really stricter selection. If a junior was placed in charge of a division before he rose to Executive rank he received the charge allowance. When promotion was extraordinarily rapid the junior got a charge allowance and scored, and when it was slow he would score under the Civil Engineers' Association's proposal without holding a charge, but the present hardship might be eliminated by greater selection.

81,014 (*Mr. Chaubal.*) The witness said that all Imperial Engineers were included in the Civil Engineering Association, Railway, Irrigation, Roads, and Buildings men. He thought Civil Engineers who were not on Railways would admit that the proper training for Railway Engineering could not be obtained in this country. There was no possible comparison between Railway work and other Engineering work.

81,015. With regard to men being prevented from going to England on account of not being sure of getting an appointment when qualified, the witness pointed out that when Cooper's Hill was an open College very few Indians entered it. His statement that Railway Engineering was not a subject which appealed to Indians was more than a surmise as it was supported by very long experience. When Cooper's Hill was in existence it was not attended by Railway Engineers on English Railways who, as a rule, were apprenticed to an Engineer under Articles. Even now to a very large extent English Railway Engineers did not go through Colleges, probably having taken their theoretical instruction at school before coming apprentices.

81,016. (*Lord Ronaldshay.*) The witness said the work of an Executive Engineer was of much greater responsibility than that of an Assistant in all cases. With reference to an Assistant Engineer in the top grade drawing the pay of an Executive Engineer whether he was exactly performing the duties of an Executive Engineer or not. it was certainly reasonable that a man's pay should bear some relation to the work he was doing, but that state of affairs ought to be avoided as far as possible and it could be avoided by selection.

(The witness withdrew.)

J. WOODSIDE, ESQ , Officiating Chief Engineer to the Railway Board.

Written Statement relating to the Railway Department.

81,017. I tender my evidence to the Royal Commission as an officer of the Engineer Establishment of the Indian State Railways. I have been officiating in the appointment of Chief Engineer with the Railway Board since July 1913. I am not concerned with the actual administration of the Department but have had considerable experience as an Engineer on State Railway Construction. The opinions which I express are those held by me personally and are not necessarily shared by the Railway Board.

I have seen a Written Statement on the Engineer Establishment of State Railways which has been submitted to the Royal Commission by the Officiating Secretary, Railway Board (paragraphs 80,844-922), and I associate myself generally with the views expressed therein. In the circumstances stated above, I shall not be expected to add to what is stated in that Statement as to facts regarding existing rules, etc. I desire, however, to add the following observations which are based upon my more intimate knowledge and wider experience of the State Railway Engineering Department.

81,018. **(I.)** Method of recruitment, and **(II.)** Systems of training and probation.—I think that since the introduction of the practice of recruiting Engineers from the Rurki College on lower rates of pay than those given to men appointed by the Secretary of State in England, the class of Engineer appointed in India has decidedly deteriorated. This is presumably attributable to the inferior attractions offered by the Provincial Service. *So* far as I can judge there is no reason why the *Railway* Engineer Establishment should be divided into two classes; and I would recommend the abolition of recruitment to this Department of Provincial Engineers, and the employment of only one class of permanent Engineers, on pay corresponding to the existing Imperial scale as was the. case before the introduction of the Provincial Service. I am decidedly of opinion that this list should be large enough to supply all the Engineers necessary for the normal requirements of the Department. and that the existing practice of employing *a* large number of temporary Engineers to supplement deficiencies should be, *as* far as possible, abolished. It would of course, be necessary to employ temporary staff in the event of an abnormal amount of work being undertaken.

For the recruitment of the (unified) Engineer list I would support the proposal that has been placed before the Royal Commission by the Civil Engineer Association* for the re-establishment of the Royal Indian Engineering College, Coopers Hill, or a similar training college in England. The re-establishment of such a college would be practicable if most of the recruits required for Indian Public Works and Telegraph Departments as well as State Railways were educated there. The technical college training obtainable in India is not as good as that obtainable in England. The most up-to-date Railway Engineering practice cannot be seen in India. I contemplate that the college training should be followed by *at least* a year's practical course on Engineering work in England.

All appointments should, I think. be made on probation in the first instance.

81,019 **(III.)** Conditions of service.—Subject to what follows these are generally satisfactory. I have been unable to ascertain whether an officer whose promotion in the Executive class has been delayed under the rule which limits a man to the minimum of an Executive Engineer unless he is actually in charge of a Division, would have his subsequent promotion throughout the Executive class similarly delayed. I am told that he probably would, but that the case has not yet arisen in practice. Such cases are, I believe, likely to occur in the near future, and I think that it should be clearly laid down that the effect of such a block of promotion should *not* be permanent. Indeed, I would strongly urge that the rule should be entirely abolished and that an officer's promotion on the time-scale should not be hindered through circumstances which are outside his own control. The *55* year retirement rule, is in my opinion, an entirely satisfactory one. An exception was allowed recently to its operation and was productive of much dissatisfaction.

81,020. **(IV.)** Conditions of salary.—The rates of pay have recently been improved and it is perhaps too much to expect that there should be a further increase in the near future. I would say that in my opinion the most unsatisfactory point is that an officer has now to rely upon his salary to enable him to set aside money to supplement a hopelessly insufficient pension or his almost equally inadequate leave allowances.

81,021. **(V.)** Conditions of leave.—I am decidedly of opinion that the existing leave rules are very illiberal in the matter of the allowances granted, and that it is only reasonable to claim at least that the maxima. and minima limits applicable to officers of the Army employed in the Civil Departments should also be aplicable in the case of the Engineer Establishment. I think also that the existing restrictions in the grant of leave might well be simplified, and in particular that an officer might be allowed any leave earned by him, if he can be spared, irrespective of the time that has elapsed since his last return to work. I would also recommend that the restriction under which an officer is not allowed to take privilege leave preparatory to retirement should be done away with. "Study leave" to enable officers to keep abreast with the latest developments in European Engineering practice should be freely granted. I regard this as a matter of much importance. Such leave has, I believe, proved most beneficial in the case of the Medical Department; and I think that it might with advantage be granted up to say a year in one's total service.

81,022. **(VI.)** Conditions of pension.—I feel that the pensions admissible under the existing rules are, as I have stated above, hopelessly inadequate; and that the grant of the rates of pension asked for in the Engineers' Memorials which have long been under the consideration of Government would be only reasonable.

81,023. (VII.) Employment of non-Europeans.—I have had very little experience of the work of non-Europeans under my control except in purely subordinate capacities, and can only form opinions on general grounds. There appears, however, to be a general concensus of opinion that the Indians hitherto employed upon State Railways in the higher posts are not as a rule up to the requisite standard in regard to the assumption of personal responsibility. and in the maintenance of discipline among a mixed staff. The number employed on lines worked by Companies is very small.

Mr. J. WOODSIDE called and examined.

81,024. (*Chairman.*) The witness said he had occupied his present position since July of the present year. He had been in the Railway Department since 1886. The written statement expressed his own personal views, and not necessarily those of the Railway Board.

81,025. He was in favour of abolishing the division of the Railway Engineer Establishment into two classes, and suggested that all officers should be recruited to the superior cadre under Imperial rates of promotion and pay. He would employ as many Natives of India in the superior cadre as complied with the qualifications.

81,026. He suggested the abolition of recruitment in India as was at present the practice, but he admitted that this might have an injurious effect on the standard of efficiency of the colleges. He was looking at the matter from the engineering point of view, but he agreed that there were other aspects of the question.

81,027. To his knowledge Indians had not been passed over for promotion to any greater extent than their European colleagues.

81,028. He thought the quality of the men would improve if the Imperial and the Provincial branches were abolished and one Service instituted. If such a scheme were adopted, he would retain the present system with regard to the appointment of officers from the Subordinate Service, namely, one in every two years.

81,029. He thought there should be no difference in the pay of an officer coming from England, and an officer drawn into the Service from India. Both were doing the same work. He did not think there need be anything in the nature of a foreign service allowance for the former, or that such a proposal would modify in any way the dissatisfaction which at present existed.

81,030. He supported the proposal for the revival of an institution on the model of Cooper's Hill, but he admitted that in view of the recent abolition of that college, Government would require a great deal of inducement to restore it. In advocating the revival of a single institution, he did so, because, from his observation the officers who caine from Cooper's Hill were superior in efficiency to those who came from other institutions in the country. He held a very definite conviction on that point. Ha had not much knowledge of such institutions as Glasgow, Manchester and London Universities, but he should say the training offered in them was not superior ta that formerly given at Cooper's Hill.

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* *See* **evidence relating to the Public Works Department, Volume XVI, paragraphs 72,155-63.**

81,031. The deficiency in the technical training of the Indian colleges compared with that of tho English colleges lay in equipment, facility for study, and climate; but, as he had said he had no experience of English colleges and therefore was not able to compare them with an institution like Cooper's Hill.

81,032. Indian railway engineering practice was far behind English and American railway practice, and therefore he suggested a year's training on railways in England €or officers selected €or the service. Re thought that. could easily be arranged with the English railways, and felt confident that a thorough training could be ensured. His suggestion that appointments should be made on probation would not, he thought, have any appreciable adverse effect upon recruitment. He thought recruits were only taken from Rurki at present; he was not sure whether any were taken from other colleges.

81,033. He would be in favour of a scheme that distinctly laid down that a man should enjoy the benefit of increments within his own grade, and that when he was promoted from that grade, he should commence at the bottom salary of the next grade.

81,034. On the whole, he did not think there were cases where it would be to the advantage of the Service for an officer to be retained beyond 55 years of age. There might be individual exceptions, but he would prefer the rule to be absolute in the interests of the Service.

81,035. With regard to his recommendation that study leave should be granted, he had not considered the details under which such leave should he given. There was no encouragement at present for officers to improve themselves. He did not consider a tour round India would be of equal value to study leave abroad.

81,036. He thought the present leave allowances were very liberal. *He* was not in favour of a scheme allowing a certain period of furlough to be commuted into full pay. Looking upon officers as Government machines, he thought it would not be to their advantage to have short leave on full pay, but it would be better that they should have the full period of leave.

81,037. He endorsed the proposals contained in the Engineers' memorial" *as* to pensions. He did not think that a maximum of £940 a year was excessive in the comparison with the contributory pension of £1,000 in the Indian Civil Service. We thought if an increase of pension were allowed, the Service would be prepared to forego optional retirement at 20 years, and give Government an unrestricted power to retire any officer they desired at 25 years. Many officers when they joined the Service had the idea they mould like to retire at 20 years, but when that time arrived, very few of them did so. Re conld not remember any instances of valuable officers leaving after 20 years' service in order to take up private practice.

81,038. Re agreed with Mr. Ryan's statement that under present conditions it was necessary to employ Temporary Engineers for maintenance as well as for constructional work, and that the present cadre was barely sufficient for the maintenance of constructive work: His view was that such officers were really serving under a misnomer; they were practically permanent officers. They were kept on year after year because the cadre was not increased. He suggested that the present staff of 50 Temporary Engineers should be added to the cadre. He agreed that this would increase the establishment expenses to the extent of the difference between the Temporary Engineers' pay and the established Engineers' pay and the pension. As a whole, he regarded the Temporary Engineer as inferior to the permanent engineer. *Most of* them were Assistant Engineers, and not Executive Engineers. He thought thO suggestion made by Mr. Ryan, that when the State Railways did not require the increased cadre, a portion of it should be lent to outside companies was a practicable one. If the Companies were not ready to take on additional men, he thought work could always be found for them on survey. He did not think that would be an expensive method of dealing with the Survey. He had no suggestions to make as *to* how the conditions *of* service of the Temporary Engineers might be made more satisfactory.

81,039. With regard to the employment of Royal Engineer officers in the Railway Department, he thought they should come in at the bottom of the list. These officers were a valuable element in the Service, and he would deprecate their removal.

81,040. (*Lord Ronaldshay.*) He mas only prepared to answer questions dealing with the engineering branch of the Railway Service. He did not see how any proof could be obtained for the statement that the work of a Temporary Engineer was of an inferior character to that done by a permanent engineer, and that more money in the end had to be spent on it than would have had to be expended *if* the work had been performed by the permanent staff. He could not give any instance where constructional work which had been largely carried out by Temporary Engineers had been so badly dona that large additional sums of money had sooner or later to be spent on it.

81,041 (*Sir Theodore Morison.*) The volume of Engineering work to be performed by Government varied a good deal *from* year to year, according to the money available. Fluctuations could not be got rid of, but *in* the past, before the class of Temporary Engineers was introduced, fluctuations existed, and the difficulty was overcome by employing men OR Survey work. Hc thought it would be very difficult to carry out a scheme under which the Government should work with a very small nucleus *of* permanent staff, and with a large number of Temporary Engineers. He thought the Government would not be able to obtain good men under such terms.

87,042. With regard to his scheme for abolishing the Provincial Service, he contemplated that Indians should obtain their training at a College after the style of Cooper's Hill. In the event of Cooper's Hill not being revived, the Indian might go to England, and get trained at one of the colleges there. In his experience, the earlier Rurki men who were Imperial officers were distinctly better than the present Rurki men. At the present time the good Rurki men entered other services, as the prospects in the Indian Railway Service were not sufficient to *attract* them. He did not anticipate there would be any difficulty *in* carrying out his suggestion that a man should have a year's training on an English railway. He understood it was quite easy for a man to get an appointment for a year on some new English railway work.

81,043. (*Mr. Chaubal.*) Out of the SO Engineers who come from England every year for the Public Works Department, nearly all came with degrees from the inrtltutions be had mentioned in his written statement. Very few came with only a practical experience of two years. The terms of their appointment were that they should have at least a year's training on railways before coming to India, as well as a diploma. He did not agree with the statement that so-called piactical experience in England was generally a farce, and in no case of much use *for* Indian railway work. He thought it was a most valuable and most important part of the four years' course. He would agree with the statement that by the time a Rurki man rose to be an Assistant Engineer of the second grade, he was a long way more useful than the newly arrived Cooper's Hill man. who joined in the same grade at the same pay. The Rurki man would have had more experience of the conntry, and he might be for the time being a more useful officer than *a* newly joined man. It would be very difficult for Indian colleges to nork up to the standard of English colleges, because they were isolated from engineering opinion. He did not know of any

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* *Vide* evidence relating to the **Public Works Department**, Volume XVI, *paragraph* 72,160.

M.I.C.E. man trained in local colleges, or any first class Local College men who had held posts as Executive Engineers.

81,044. (*Mr. Sly.*) He had spent all his service in the Railway Department. He was appointed to the Railway branch after he came out to India. He had not had very much experience of recent recruits to the Public Works Department. From the experience he had had, he did not think they were equal to those who came out in previous years. Under his proposal recruitment to the superior State would be confined to England, there would be no recruitment in India at all. Assuming that such a scheme was not approved, he would still recommend making the pay of such men as would be recruited in India equal to that of officers recruited from England. He had not come into touch with Indian engineering institutions like Rurki, Madras and Poona. He had not interested himself in the engineering world of India outside his own service. When the conditions offered to Indian engineers were better than they were at present, a much better class of man was obtained. He agreed, therefore, that if better opportunities were given to Indian engineers, Rurki would turn out very much improved men.

81,045. (*Mr. Mudge.*) What stood in the way of restoring Rurki College to its original condition were the present inferior prospects of the Provincial Service. He would not be prepared to advocate that Rurki should be restored to its former condition in the absence of a revival of Cooper's Hill. He thought it would be better for a man to go to England and be trained in colleges there.

81,046. He thought it would be possible to produce curves of variations in constructional work at periods of five years, but he did not think such would be of any great value.

81,047. (*Sir Valentine Chirol.*) The functions of the officiating Chief Engineer were to give advice to the Railway Board on technical engineering points. He, therefore, did not come personally into touch with the manner in which the staff worked.

With reference to his suggestion that a man should have a year's practical training on an English railway, he had not made any enquiries as to whether or not that was possible at the present time.

(The witness withdrew.)

H. D. Green, Esq., Executive Engineer, North-Western Railway.

Written Statement relating to the Railway Department.

81,048. (I.) Method of recruitment.—Officers of the Engineering Establishment of the Public Works Department are recruited as follows:—

(*a*) by the appointment of Civil Engineers selected by a Committee in England;

(*b*) by drafting Royal Engineers into Civil employ;

(*c*) by the appointment of Civil Engineers from amongst the successful candidates of Indian Engineering Colleges;

(*d*) by the appointment to the Permanent Establishment of Temporary Engineers, how-so-ever secured;

(*e*) by the promotion of selected officers from the Subordinate Grades;

(*f*) in addition to the above Permanent Pensionable Establishment, Temporary Engineers of various qualifications are appointed.

Though all the above officers are required to do the same class of work, irrespective of their source of recruitment, they have been classified as follows:—

(*a*), (*b*) and (*d*) ...	Imperial Service.
(*c*) and (*e*)	Provincial Service.
(*f*)	Temporary Service.

Recruits from England are appointed by a Selection Committee at the India Office without competition. The number of appointments from this source averages 30 per *annum*. The annual recruitment in India is approximately 14, viz., 9 from the successful candidates of Indian Colleges, and 5 from selected subordinates. The proportion of recruits from England and from Indian Engineering Institutions, *i.e.*, excluding promoted subordinates, is thus approximately, 30 to 9. That is to say: only 20 per cent. of the total annual recruitment is obtained from the Indian Colleges, and 70 per cent. from England. The remaining 10 per cent. is obtained by selection from the subordinate grades. Previous to the sitting of the Public Services Commission of 1886-1887, the recruitment from Indian College was 30 per cent. of the total annual appointments. Notwithstanding that the said Commission recommended a gradual increase, the reverse has, in fact, taken place.

It is asserted that the legitimate aspirations of the public in India cannot be satisfied, unless a greater proportion of the superior appointments in the Public Works Department are reserved for competition in this country. It is suggested that at least 50 per cent. of the total annual recruitment be made in India at present, and that this proportion should be gradually increased as conditions change.

81,049. (II.) System of training and probation.—Civil Engineers appointed from England are, as a rule, men who have undergone a short training on works after graduation from certain recognised colleges and institutions. These men are not required to undergo any further training in India as probationers, after appointment. Civil Engineers appointed in India are the most successful candidates from the Indian Engineering Colleges. They also undergo a practical training, as probationers, for one year in the Department. No recognized qualifications, either practical or theoretical, are required for appointment as a Temporary Engineer. But a large number of Temporary Engineers are men who have been unsuccessful in obtaining the permanent appointments made from Indian Colleges.

The former system of appointing Civil Engineers from a central Engineering College, by open competition, is more suitable for men going from India to England, than the existing one.

81,050. (III.) Conditions of service.—All permanent engineers, irrespective of whether they are recruited in England or India, have precisely the same responsibilities and duties, and do precisely the same work *from the very commencement of their service*. They are on the same list for promotion, and are promoted side by side. In spite of this, Indian Engineers are on a considerably lower scale of pay and pension, on worse leave rules, and they are granted much lower local allowances. They are, however, governed by the same rules, and are granted the same allowances while travelling on duty.

The differences in pay, pension, leave rules and local allowances are the sole cause of the great discontent which prevails among the engineers recruited in India.

It is inconceivable why, on account of these anomalous unjustifiable differences, the engineers recruited in India should be dubbed with the term "Provincial," which is, and as recognized in all other departments, to apply solely to subordinate services, or services recruited from promoted subordinate. *There is no analogy whatever between the so-called Provincial Engineer Service and other Provincial Services.* This is a fundamental point which should be borne in mind throughout the investigation. The unfortunate trials and hardships which Indian trained engineers in the Department experienced during the last 18 years can best be seen by a perusal of the Memorandum submitted by the Association of Indian College Engineers. The conditions of service in connection with the Accounts, Finance, Traffic, and Police (*until* recently), are specially worthy of consideration, for they serve both to emphasise the injustice of the Provincial Engineer Service, and to dispel the erroneous belief *that it is the general rule that members of the Public Service recruited in India are on a different footing, as regards pay, leave, and pension rules, to officers obtained from England.* In the superior establishment of State Railways, comprising the Engineering, Signals, Locomotive, Traffic, Accounts, and Carriage and Wagon Departments, the only Department where any distinction is made between men appointed in England and India is in the Engineering. In all other departments, men appointed in

England or India and those promoted from the subordinate ranks, are on an absolute equality.

81,051. **(IV.)** Conditions of salary.—The pay and local allowances of the engineers recruited in India are approximately two-thirds of that granted to officers recruited in England, the difference in pay alone in 20 years' service amounts to Rs. 63,600, exclusive of interest. It is a fixed principle in all superior departments, where officers are trained to do the same work and hold the same responsibilities *from the commencement of their service,* that they draw precisely the same pay and allowances. No distinction is made, whether the officers are Indians, Anglo-Indians, or Europeans, appointed in England or India. Therefore the two-thirds scale of pay fixed for engineers appointed in India is unjustifiable. Attention is again called to the fact that, there is no analogy between the so-called Provincial Engineers Service, and other Provincial Services. This lower scale of pay is most unsuitable and insufficient for officers holding superior posts. It also creates grave anomalies, in that, Engineers appointed in India often draw less pay than other Engineers with less service working under them.

81,052. (V.) Conditions of leave.—Here, again, there is much disparity between the conditions applying to each of these two classes of officers. Great stress has been laid on the advantage to be derived by an engineer in visiting works in foreign countries, and the element recruited in England has received undue credit on this account. Unless the conditions of leave are the same, it becomes impossible for Indian trained men. even if they desire to do so, to secure the same advantages in this direction as engineers appointed in England. Again, the nature of an officer's duties in the Public Works Department, involves continued exposure and discomfort for long periods and the health of all officers is liable to suffer alike. There is therefore no reason to perpetuate the present distinction. Again, officers recruited in India in certain other services, *e.g.*, the Traffic, Accounts, Opium, Finance, are under more favourable leave rules, and there is no reason why engineers appointed in India should not be on an equal footing with these other services.

81,053. **(VI.)** Conditions of pension.—Here, again, there is much resented distinction, wide article 636 C. S. R., which will create unfair anomalies. For example, an engineer appointed in India, retiring as a Chief Engineer, will draw less pension than his own subordinates recruited in England. It is submitted, that it is a well and universally established principle, that pensions are granted as retiring provisions for specific services rendered to the State, and it is therefore illogical and unjust to create or maintain any distinction in this direction between persons who have in fact rendered exactly the same services. In other words, pensions ought to be wholly and solely dependent on specific services rendered, and not on source of recruitment.

81,054. **(VII.a)** Limitations in the employment of non-Europeans.—The number of Indians eligible for appointment in England is limited to 10 per cent. of the total annual recruitment. The present system of training and selection in England, amounts to a limitation to a certain extent to Anglo-Indians, in that there is a greater degree of uncertainty in being appointed, than by the old system of open competition in a central training college.

A system of open competition without limitations is recommended.

91,055. **(VII.b)** Working of the existing system of division of services in the Public Works Department into Imperial and Provincial.—The term Provincial in this service is a misnomer. The division as it exists has been anything *but a success* and can *never* be so in view of the surrounding circumstances and the past history of the Department. The distinction cerated between the two classes of officers who do exactly the same work, and bear exactly the same responsibilities, *from the commencement of their services,* is intensely resented and will inevitably result in splitting up the whole service into two hostile camps, and this must greatly injure efficiency. The general feeling of *esprit de corps* which formerly prevailed, has ceased to exist. In its place there will assuredly spring up a deep and widespread feeling of suspicion and distrust between the two classes of officers, which must wreck harmonious working.

So long as the two classes possess, on the average, equal educational and professional attainments, as is undoubtedly the case, any differentiation between them is unworkable. It is impossible to force a distinction in pay where none exists in attainments, and any attempts to do so must create complications and raise issues which it would be well to avoid.

Again, it is in fact true that many engineers appointed in India possess superior qualifications to some engineers appointed in England.

It is therefore urged that such differentiation should be abolished and that there should be only one service in the Public Works Department.

81,056. **(VIII.)** Relations of the service with the Indian Civil Service and other services.—The relations are good and satisfactory.

81,057. **(IX.)** Other points. —*Temporary Engineers.*—The position occupied by these officers in the department is undoubtedly most unsatisfactory and requires consideration. These officers are at present recruited in an irregular manner, *viz;*

(*a*) From Indian trained and duly Qualified Engineers who have failed to secure guaranteed appointments when competing for them.

(*b*) From Engineers appointed under covenant in England.

(c) From unqualified persons appointed in India.

It is submitted that, except in special cases where experts are required, these officers should be recruited from qualified persons who have undergone the prescribed training in recognized Indian Engineering Colleges, and that no other persons should be engaged until this source of supply is exhausted. It is contended that this arrangement will be beneficial to State Colleges in India, and will tend to attract suitable candidates.

The present conditions under which these officers serve, are not such as to secure efficiency. There is practically no security whatever, for they are liable to be discharged with very limited notice, regardless of the length of their service. It is suggested, that such service should be regarded as permanent non-pensionable service, and that there should be an incremental scale of pay.

The service may be called the Extra Engineer Service, and may be divided into Extra Assistant, and Extra Executive Engineer Classes.

MR. H. D. GREEN called and examined.

81,058. (*Chairman.*) Witness said he was an Executive Engineer on the North-Western Railway. He had been 15 years in the service, serving one year as apprentice, and 14 years as a permanent officer. He had been in an executive charge since 1905. The total number of permanent engineers on railways was 135, of whom 57 were on the North-Western Railway, and he appeared before the Committee to represent 14 Provincial Engineers.

81,059. He desired to see the distinction between Imperial and Provincial Branches abolished, and the Imperial Service recruited half in India and half in England, and to serve under the same conditions. He thought 50 per cent. of the recruitment to the superior service could be undertaken in India without any deterioration of efficiency. He was of opinion that the training at Rurki was as good as that given in the training colleges in England. Men from both places had worked side by side since 1847, and he did not think there had been much to choose between them. With regard to administrative capacity, he referred to a list submitted by the Secretary of the Association of Indian College Engineers which showed that at least two out of every five men from Rurki had risen to the administrative ranks, which was a higher percentage than for men from England. He would like to see all officers placed on the same rate of pay. He did not think there should be any foreign service allowance for a man coming from England, He considered Rurki college could be made more efficient if it were staffed with more efficient professors. He did not think it was necessary for an officer at the commencement of his service to have a European training. He thought if Indian-trained officers were given sufficient pay and sufficient leave, they would profit largely by going to England after *a* few years in the service, and this would keep them up to the level of Imperial men who are able to pay visits to England. For the first few years of his service in India, *a* man recruited in India was, if anything, more useful than a man recruited from England, inasmuch as he knew the country and language, and his college training had been a very practical one. He thought the field of observation in India was as valuable a one, from the engineering point of view, as could be found in England for the first few years of a man's service, but later on he thought an officer should go to England. Personally, he had never been to England, and could, therefore, only speak from Indian experience, but he based his statement on the fact that Rurki engineers who had been home after a few years of service had greatly profited by doing so. He thought it was only right that, under his proposed scheme, an upper subordinate officer should be put on the same Imperial scale as a man recruited from college. The former never had the same prospects as the man who was trained for the superior service in Rurki, in that before he could be promoted to the superior service, he had lost a number of years, which practically debarred him from ever becoming a Superintending Engineer. He considered the number to be promoted from the subordinate service should remain as at present.

81,060. Temporary Engineers should be employed in future on a permanent non-pensionable basis. That was not exactly what was taking place at the present time. There was less permanency about them than, say, about a traffic officer, because the latter was on a cadre, whereas the former was not on any cadre whatever. The fact of calling a Temporary Engineer a permanent non-pensionable officer put him on to a cadre, but that cadre should be distinct from that of the pensionable man. There were altogether 55 Temporary Engineers on the North-Western Railway. If a cadre of one-fifth of that number was established, it would mean there would be eleven deserving men on it. The balance would remain very much as they were at the present time, but certainly they would have hopes of getting on to the permanent cadre at some time or other, and he thought that would satisfy them. Eleven out of the 65 would be permanently employed in the service without a pension, but they would have the benefit of an incremental scale of their own. He did not think such a scheme would accentuate the discontent at present existing. Even if they were given *a* pension, it would not matter as long as they were on a separate cadre, because the main objection to making the Temporary Engineer permanent was that if men were brought into the Permanent Service, officers already in the service were adversely affected. If Temporary Engineers were absorbed into the cadre as had been suggested by other witnesses, it would cause *a* block in promotion, and disturb the whole organisation. He did not think it could be arranged in such a way as to avoid a block. The only way to avoid a block would be to put the Temporary Engineer on a separate cadre which cadre could be revised after every 5 years and the number increased according to requirements.

81,061. (*Sir Murray Hammick.*) Under his proposed scheme, entrance to the service would be by open competition from all the four Indian colleges, and not from Rurki alone.

81,062. (*Sir Valentine Chirol.*) In his opinion there was no foundation for the statement that Rurki turned out, prior to the division of the service into Imperial and Provincial branches, much better men than it produced at the present time. They continued to perform their work in quite a satisfactory manner. He would not say that Rurki was considered to be at the present time *a* better school for the purpose of the study of railway engineering than other schools in India. He thought the present system of training was better than a scheme for centralising the study of engineering in one Indian college.

81,063. (*Mr. Abdur Rahim.*) He believed it was a fact that several men who had not succeeded in qualifying themselves at Rurki went to England, and were appointed from there to the Imperial Service after, he supposed, some course in one of the colleges there. He could not tell how many Hindus and Muhammadans there were at present at Rurki, but in 1906 to 1908, when he was there, out of a class of 20 there were 11 domiciled Europeans and Anglo-Indians, the rest being Hindus.

81,064. (*Mr. Madge.*) He made the recommendation that 50 per cent. of the appointments should be confined to India, after having judged of the merit of the work of officers of all classes. The only alternative to his recommendation for alleviating the present unsatisfactory position of the Temporary Engineers, seemed to be to revise the cadre periodically, and only to transfer very junior men from the Temporary Engineers' list to the permanent cadre. That was the only other scheme which would not cause discontent.

81,065. (*Mr.* Sly.) In his view Temporary Engineers should be employed on a separate permanent incremental scale, but he admitted that that might be strongly resented by the Temporary Engineers themselves, *and* that their grievance would be exactly the same as that of the Provincial officers until they were put on the same cadre as the Imperial Engineers. They would urge that they were doing the same work, but were not getting the same pay and were on the same list; and witness thought they would be justified in their contention.

81,066. (*Mr. Chaubal.*) He thought there ought to be open competition for entry into the Imperial Service, instead of the present system of selection.

81,067. (*Sir Theodore Morison.*) With regard to the complaint that officers recruited in England were being paid a larger salary than was paid to officers recruited in India, although both were doing the same class of work. witness was certainly not of the opinion that in order to get rid of that complaint the pay of the Imperial officer should be brought down to the level of the Provincial officer's pay. A man would not be able to exist upon it. He stated that an Engineer in this country could not live on the same salary as an Engineer in England as the conditions were totally different. He would add that the standard of living of Indian-trained Engineers is precisely the same as that for men appointed from England.

(The witness withdrew.)

THE EARL OF RONALDSHAY, M.P.
SIR MURRAY HAMMICK, K.C.S.I., C.I.E.
SIR THEODORE MORISON, K.C.I.E.
MAHADEV BHASKAR CHAUBAL, ESQ., C.S.I.
ABDUR RAHIM, ESQ.
WALTER CULLEY MADGE, ESQ., C.I.E.
FRANK GEORGE SLY, ESQ., C.S.I.
JAMES RAMSAY MACDONALD, ESQ., M.P.

Written Statement relating to the Railway Department.

(NOTE.—This Statement expresses the personal views of Colonel C. H. Cowie on the more important points of the evidence given by the Secretary, Railway Board,* as to the present conditions of service of Officers employed on State Railways.)

81,068. The Secretary, Railway Board, has given all necessary information as to the present systems of recruitment, conditions of service, &c., which are the same for all three State Railways, and I have confined my remarks and suggestions in this written statement to those points in each service of the Railway, which my experience has shown me really require improvement or alteration.

I have completed 30 years' service in India, during which, with the exception of time spent on Active Service (3 months in Tirah Campaign, 1897-98, and 2½ years on Military Railway work during the South African War), I have been employed on State Railways, commencing as an Assistant Engineer on Construction and Open Line for nearly five years, and then passing over to the Agency Branch.

For about 8½ years, including short periods of officiating, I have held charge as Administrative head of a State Railway system.

81,069. **(I.)** Methods **of** recruitment, and **(II.)** System **of** training and probation.—My experience of Cooper's Hill and Royal Engineer Officers as compared with Officers recruited for Railway service by the various other methods from time to time in force, has led me to the conclusion that for all Railway service. except in the Locomotive and Carriage and Wagon Departments, the best results would be obtained from the establishment of a Training College in England to which admission would be gained after passing an educational and physical fitness test, and from which those passing the standard of qualification would receive appointments on Indian State Railways, after a period of probation on practical Engineering or Traffic work in England. This should, in my opinion. form the main method of recruitment for Europeans and Indians for the Engineering and Traffic Branches. For the Stores Branch, which is at present—quite improperly, in my opinion—on a lower footing than the above branches, owing to the present pay and methods of recruitment, I should select from time to time Officers who have received appointments from the College. There would always be a certain number with aptitude for the work and desirous of a more sedentary life if pay and prospects were improved. The importance of the Stores work and the responsibility fully justify improvement in the present pay and conditions of this service.

Failing the establishment of a Training College in England, I have no alternative to suggest for the present method of recruitment except that the Stores Department should be chiefly recruited as suggested in the para. above. But I am strongly in favour of stopping the recruitment of Temporary Engineers, and gradually working up to a service of Permanent Engineers only, and I also consider that it is a mistake to have lower paid Provincial Engineers on Railway work.

Only men of the highest qualifications should be employed on Engineering work on Indian State Railways, and Provincial Engineers should only be appointed if they are up to the higher standard, when they should be placed on the same conditions of service and pay as other Permanent Civil Engineers recruited for Railway Service.

81,070. **(IV.)** Conditions **of** salary.—The only suggestion I have to make in regard to the scales of pay of Civilian Executive Officers is that there should be a higher grade of Rs. 1,250 for District Officers of the Superior Revenue Establishment, to which Officers who are not selected for appointment to the Administrative grades should be allowed to rise after a period of service in the present highest Executive grade.

In the higher Administrative grades the pay on the North Western Railway is not, in my opinion, sufficient, taking into consideration the magnitude of the charge The Agent, Traffic Manager and Locomotive Superintendent of a system such as the North Western Railway, who are specially selected for their appointments, should, I consider, receive pay at least equal to that given on the principal companies' lines.

I have also to suggest that provision should be made for some promotion to Deputy Traffic Managers and Deputy Locomotive Superintendents, who at present remain on fixed pay of Rs. 1,500 until they are selected for appointments as Heads of Departments. In the case of Deputy Agents this provision exists, two out of the four appointments on State Railways carrying a salary of Rs. 1,750, and there appears to be no good reason for the absence of similar provision for promotion for Officers of the other two branches.

Since I joined the Railway service there have been several changes in the pay of Royal Engineer Officers in the Executive and Administrative branches, the general tendency of which has been to reduce their emoluments. The history of these changes is given in the Memorandum submitted to the Royal Commission by Royal Engineer Officers in the Railway and Public Works Department of India, which ends with a request that the scale of pay of all Royal Engineers in the Railway and Public Works Department, in Administrative, Executive and Assistant grades, be fixed with back effect on the basis laid down in Public Works Code, Edition 1907, para. 10, prior to 15th October, 1906, *i.e.*, consolidated Civil pay equal to the Civil pay for Civil Engineers or Civil Railway Revenue Officers, as the case may be, of the same standing, plus the net Military pay of their rank. These are the conditions of pay on which I joined the Railway service, and I consider that good reasons have been advanced for re-introducing them.

The pay of Chief Storekeepers has lately been increased, but nothing further has been done to improve the status of the Department. As stated by the Secretary of the Railway Board, a radical alteration of the existing methods of recruitment and payment is required, and might well be carried out on the lines of his proposal.

81,071. (V.) Conditions **of** leave.—I have only two suggestions to make in regard to the present conditions of leave. One, that the restriction on the accumulation of privilege leave for more than **3** months should be withdrawn, and the limitation of **3** months be applied to the grant of such leave only. The other, that an Officer should be allowed to avail himself of **all** privilege leave due to him immediately prior to retirement, and be permitted to retire from the service at the end of his leave, without having to rejoin for duty as he is now obliged to do; the concession has already been given in the case of privilege leave combined with other leave, and its application to privilege leave taken alone would be much appreciated by all classes in the Railway service.

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* See paragraphs 80,846 *et seq.*

81,072. **(VI.)** Conditions **of** pension.—Of late years there has been considerable dissatisfaction among the pensionable staff of the Railway in connection with the amount of their pensions, which are represented to be inadequate to enable them to live in decent comfort in England on retirement owing to the increase in the cost of living. In my opinion an increase in the scale of pensions is required, and would do much to facilitate the recruitment of good men, in addition to the advantage to Government of securing contentment among the present staff. The scale of ordinary pensions asked for by the Imperial Service Engineers in their Memorial addressed to the Secretary of State, is not, I think, too high, in view of the increase in the cost of living at Home, and I am in favour of the adoption **of** the principle of giving **an** extra pension for each completed year of service as a special service pension to those who have risen to the Administrative grades. I also suggest the adoption of this principle in the case **of** Royal Engineer Officers who at present receive no addition to their pension for service in the Administrative grades. There is, I understand, **a** precedent in the case of I.M.S. Officers in Civil employment who can qualify for a higher pension in certain appointments.

The Superior Revenue Establishment of State Railways is **a** non-pensionable service, and Officers employed in it receive in lieu of pension the benefits of a Provident Fund. The question of the adequacy of the present Railway Provident Fund, as a provision after retirement, has been the subject of much discussion on State and Companies' Railways.

The Secretary to the Railway Board has explained in his Written Statement (paragraphs 80,844-922) how the case now stands. In my opinion the gratuity granted to subordinates should be given *to* Officers.

81,073. **(VII.)** Such limitations as may exist **in** the employment **of** non-Europeans and the **working of** the existing division of services into Imperial and Provincial.—I have no remarks to offer in regard to the existing practice under the first part of this heading. **My** opinion on the second part is, as **I** have stated above, that the nature **of** the Engineering work on Railways renders it inadvisable to employ any but Engineers with high qualifications, and that there is no need for the separation of services into Imperial and Provincial as far as Railways are concerned.

51,074. **(VIII.)** Relations of the services with the Indian Civil Service **and** other services.—These are quite satisfactory as far as my experience goes.

COLONEL C. H. COWIE called and examined.

81 075. *(Chairman.)* The witness said he had held the post of Agent for about 8½ years on the Eastern Bengal State Railway, the East Coast Railway, the Oudh and Rohilkund, and the North Western Railways, his main duty being to control the different parts **of** the railway, Engineering as well as Revenue. He was in favour of the system of open competition subject to a physical test, without restriction of race. He would give appointments in the Engineering or Traffic Department, at the end of the college course on the results of the college examination.

81,076. With regard to the proposal that Storekeepers and Traffic Officers should be recruited from among men who had been given an advanced training in Engineering, the witness said it had been tried in the Indian State Railways. a certain number of Traffic appointments being given to Cooper's Hill men, and in his opinion the scheme had proved satisfactory. It might be that the Engineering and Traffic training at the college would have to be separate during the course; he thought that **was** done at Cooper's Hill in the case of the Telegraph Department, which had a separate curriculum.

81077. He was in favour of a Central College for the training of men entering the service of the Government of India, as he believed when Cooper's Rill **was** in existence a very good class of Engineer was obtained. He realised there were great difficulties in the way but he did not think it was practically impossible to revert to Cooper's Hill. He spoke from an experience of men who had passed through Cooper's Rill, Woolwich, and Chatham, and those recruited elsewhere. It was not simply a matter of technical training but a question of developing character and the power of commanding men, and for that he had always preferred the man who had been trained at a central college. Since Cooper's Hill had been abolished he had not noticed any deterioration in technical training but had seen some deterioration in character. **He** thought the officers now obtained were not quite as good in the power **of** controlling men. An Engineering College in England should be the main source of recruitment for Europeans in India.

81.078. **He** was in favour of the present system of recruitment if statutory Natives were allowed to be taken into the Imperial Service instead of the Provincial Service of the Railway Department. Prior to 1903 a certain number of appointments were offered to pupils of the Rurki College in the Imperial Service and he should like to revert to that system, about 20 per cent. from Rurki and the rest from England.

81,079. With regard to pay, the witness said he was in favour of paying all the Engineering Officers on Railway Service alike. He supported the demand for **an** increase of pay in the Traffic and Locomotive Departments from *Rs.* 1,150 to Rs. 1,250; the proposal was intended to meet the case of those who had not been considered fit for promotion to administrative grades. If a man rose to the Rs. 1,100 grade between 40 and 45, he might be **a** very useful Executive Officer for the rest of his service and should be given some increase of pay. As far as pay was concerned, he placed such a man on the same level as the Divisional Engineer, and he thought there was some justification for that. In the witness's opinion the relation of the Deputy Traffic Manager to the Traffic Manager was much the same as the relation **of** the Deputy Agent to the Agent. The proposal to increase the pay of Deputy Traffic Managers to that of Deputy Agents was chiefly made on the ground that Deputy Traffic Managers and Deputy Agents were selected from the senior Executive Officers, and those who went into the Traffic Department had no prospect of promotion until they became heads of departments. There were cases of men who had gone in as Deputy and had remained five, six, or seven years on the same pay. The Government had recognised in the Executive grades **of** the Engineering Department that there should be some promotion after a certain period of service and had given **a** time-scale. A Deputy Traffic Agent became more valuable according to the length of his experience, but he could never rise to a higher salary until promoted to be head of a *Department. It* had been a general principle of the Government to give a rise of pay after a certain period of service. He did not think if that were done there would immediately be **a** demand on the part of the Traffic Manager to be placed on the same rate of pay *as* Agent.

81,080 The witness said an officer should be allowed to accumulate more than three months' privilege leave, but he did not think there would be any harm to the service if the leave granted at any one time was limited as at present to three months. He was not of opinion that in practice leave would be allowed to accumulate up to five or six years.

81,081 As to pension, he supported the written statement of the Engineering officers with regard to ordinary pensions and he would like to see additional pensions granted for service in the administrative grades. He had not said anything about the amount of extra pension for each year's service. The Civil Engineers had recommended £40 a year, but perhaps that was higher than was necessary. £940 for a non-contributory pension was rather high. If an increase of pension were granted, his own opinion was that officers would be prepared to forego the option of retirement at twenty years. He thought the option to retire should be after twenty-five years.

81,082. With regard to the Revenue establishment, gazetted officers should be made eligible for a retiring gratuity of a half month's pay for each year of service. A scheme with this object was under consideration by the Government of India, who were awaiting the report of the actuaries.

81,083. The witness disapproved of the employment of Temporary Engineers on a *quasi* permanent basis. He would substantially increase the cadre of permanent Engineers, and he believed employment could be found for the increased cadre in surveying and constructing railways for Companies when the Government had not work *to* keep all the permanent officers fully employed. As to whether such a method would largely increase the number of officers in the Assistant's grade and produce in years to come a block in promotion above that grade, the witness pointed out that there would be an increase in the number of district appointments. There was a certain danger of a serious block taking place.

81,084. With reference to the duties of minor charges for which no Assistant Engineers were available, the witness said occasional promotions of Engineers were made to the rank of honorary Assistant and the work was carried out satisfactorily by those officers.

81,085. With reference to the application of the Royal Engineers to be paid Civil pay *plus* net Military pay he thought that was reasonable as the Royal Engineer officer had a great many obligations which did not fall to the lot of the Civil Engineer. When the witness first came out to India the rule was that Royal Engineer Officers who went into the Public Works Department received Civil pay of the appointment *plus* their net Military pay; but since then there had been many changes in the pay and they were now receiving the same pay as the Civilians. From the Railway point of view there was no necessity to employ Royal Engineers, but he considered that the Railway Service obtained great advantage from their employment.

81,086. (*Mr. Abdur Rahim.*) The witness said he had had several Indian Assistants under him and his opinion of their Engineering work was that one or two were as good as the men who had come out from England, but that as a class their standard was not equal to that of the European engineer. The best Indian he knew came from Rurki. An Indian who had been recruited from England to the Traffic Department as a District officer was doing well, and a Rurki Engineer was engaged in administrative work. He did not think any Indian appointed in England had been in the Engineering Department. The Indians appointed in India to the Traffic Department had not really had time yet to show what they could do. Up to the present he had reason to believe they were not up to the standard of the European officer especially in matters of personal control of a very mixed staff. in the maintenance of discipline, and in the acceptance of responsibility. The best Rurki man he had known was certainly the equal of a European-trained man, but there was a difference in the standard as a class. He had had experience of about a dozen Indians altogether in the Engineering Traffic Branch, but excepting the one in the administrative grades the others were more or less junior men. Some of them were well reported on.

81,087. The witness could not agree that if the suggestion for re-establishing Cooper's Hill was not accepted the best alternative would be to have an open examination in England for recruitment to the Imperial Service. Unless the training was in a college in England he considered the present system of nomination was the best system possible. He had had no complaint brought to his notice that there were a number of recruits appointed in England deficient in practical training. The witness agreed that during the first four or five years of work as Assistant Engineer a man really required more experience of Indian conditions than Engineering skill, and that it was after that time that Engineering skill came into requisition. The only advantage a Rurki man would have in that respect would be his knowledge of the people and the language. He thought it might be a good thing to let Rurki men go to England for the study of large Engineering Works there, and he understood the Secretary of State was always willing to allow officers to go and inspect works and report on them. There was no system of study leave, but Imperial Service Engineers and Royal Engineers could always obtain leave from the India Office to study works in England and they received two-thirds pay instead of half pay.

81,088. (*Mr. Madge.*) The distinction between Railway and Civil Engineers was that the Railway Engineer was more directly concerned with the safety of the public. It was a much more important thing on the railway than on roads or bridges that no mistake should be made in any engineering work, as any slight mistake might wreck a train. Consequently the Railway required men of a very high standard.

81,089. With reference to the increase of district charges, he had just increased the number of Engineering and Traffic Districts on the North Western Railway, reducing districts from 500 or 600 miles to about 400 miles each. He had also increased the number of districts on the Oudh and Kohilkhand Railway in the same way. Therefore if the cadre of Assistants were increased, there would be a gradual improvement of promotion without much blocking. As the work on the railway increased the size of the districts would have to be reduced.

81,090. The witness considered there was a limit to the number of good men to be obtained in India but he thought some good men could be obtained. At present he believed that the standard of training at Rurki had suffered because only Provincial Engineers were appointed from that College. He thought it was very desirable that the standard there should be raised.

81,091. The suggestion to limit the number of Indians to 20 per cent. was made because he did not think more good men could be obtained in India. The witness had had domiciled Europeans and Anglo-Indians under him in one capacity or another and they had done very well, some who had passed through Rurki having been very good indeed. If any good test of character could be devised they would make good officers in the higher Departments.

81,092. The Stores Department was a very important one, and the Storekeeper required a knowledge of the Stores used on a Railway. It was not a matter of simply having custody and accounting for Stores, but of selecting Stores for use, and passing Stores, and it was important that the Storekeeper should have a knowledge of their use.

81,093 (*Mr. Macdonald.*) The witness said that the present officers so far as knowledge of Engineering and training in the art and practice of Engineering were concerned were quite as good as Cooper's Hill men, but he thought by going through a College men acquired an *esprit de corps* and certain qualities not possessed by men enlisted here and there from different sources. By character he did not mean morals but a power of enforcing respect among men. His own opinion was that the best training in the world was a Naval training, the next a training at Woolwich, and the next a training at Cooper's Hill. If men had been through discipline themselves they knew better how to enforce it on others.

81,094. With reference to pay, the witness was in favour of the same pay for Engineers recruited in England and Engineers recruited in India, and the scale he would agree to was the present scale up to the Executive grades. Indian salaries had always been lower, but if the men had the same work *to* do, he did not see why that should be so. He took into consideration the fact that the pay now given to the English recruited Engineer included an exile allowance.

81,095. With regard to the Stores Department, the witness said that in many cases the Storekeeper had not a sufficient knowledge of the Stores with which he dealt. If he had a knowledge of the uses to which the stores were put he was much more likely to be able to get a good article than if he simply sat in an office chair and inspected them. He had had experience of cases when bad stores had been purchased on account of the Storekeeper not having the requisite technical knowledge. Most of the purchases were made on annual contract, and as far as possible a Committee of Engineers supervised the matter. There were sealed patterns with which the stores had to comply. Therefore as far as possible an endeavour was made to avoid leaving the Storekeeper to select, but there were many cases where he had to do so. The witness was not acquainted with the method adopted by the War Office in England and the system by which Inspectors were appointed to inspect the stores, he believed there was nothing corresponding to that on the Railways in India. If the Storekeeper had any doubt it was open to him to apply to the Department concerned to send an inspecting officer. He would prefer to have the Head Storekeeper an Engineer than to have an Inspector of Stores. Owing to the difficulty of providing for the present staff his proposal could not be brought in at once but ultimately he should like to see a better class of officer engaged.

81,096. (*Mr.* Sly.) With regard to pensions for Royal Engineer Officers who held administrative posts, the witness did not think that if the pensions were granted in the case of Railways it would be necessary to consider the Royal Engineer Officers in other Branches of Government Service. The ordinary pension suggested for the Imperial Civil Engineers rose up to £700 and that was now the pension of a Royal Engineer Officer. If the Civil Engineer obtained an extra pension for service in administrative grades the Royal Engineer Officer would have to have the same. It was simply giving an increase for service in higher appointments as was now done in the case of Civil Engineers. A Civil Engineer who served as Superintending Engineer obtained an extra pension of Rs. 1,000 which was granted because it was considered that when a man had risen to a certain pay in India and a certain standard of living it was only right that that should be considered when he took his pension. The extra pensions were in force now and the Civil Engineers recommended that they should be continued, but that they should be given for a year's complete service instead of after three years. There had never been any difficulty in obtaining Royal Engineers for service in the Public Works Department. The number was fixed by the Military Authorities, who allowed 50 officers to go into Railways. There was a certain demand for employment in Railways by Royal Engineers at present because he did not think the effect of recent regulations had been quite felt yet. The Royal Engineers were the only service in which the emoluments had been lately reduced.

81,097. With regard to permitting Royal Engineers in Civil employ to subscribe to the General Provident Fund, the witness thought it would be very popular but the scheme presented great difficulty and would be likely to give rise to claims from the Army generally.

81,098. As to the training at Rurki, the witness did not mean to say that the instruction had fallen off, but he did not think the same class of men went in for Civil appointments.

81,099. On the subject of officers in the Public Works Department being allowed to take private practice as Engineers, the witness said he did not think that was possible in the Railway Service and he strongly objected to the proposal.

81,100. (*Mr. Chaubal.*) The witness said he understood the expenses of Cooper's Hill were borne by India. If such an institution was re-established he did not suggest that Rurki should be abolished, but the main source of recruitment should be an English Engineering College. As to the suggestion of having the Central Engineering Institution in India and recruiting for the Public Works Department through an open examination at which all candidates competed, his own idea was that it was much better to have a competitive examination for entrance to a College and to give appointments to men who had passed through the course. If any of the Colleges in India could supply men of the class of the Imperial Service Engineers who joined before 1903 from Rurki he thought the Railway Service should certainly take them. He was not, however, in favour of a competitive examination for appointments.

81,101. The witness said he did not want any Provincial Engineers on the Railways, but if men of the same standard could be obtained as used to be obtained from Rurki he saw no reason why they should not be taken. Since the introduction of the recruitment by selection by the Secretary of State commenced he had seen the work done by the men so appointed and had been personally acquainted with several of them, and his opinion was that the present men were not quite as satisfactory as the men who came from Cooper's Hill College. His opinion was based on experience and on the reports he had received from those under whom the men were working.

81,102. On the subject of pensions, the witness said the ordinary pensions had remained the same during the time he had been in the Service. There was a great deal of dissatisfaction amongst Civil Engineers as *to* the amount of the pension and he thought it would be soon realised that the Service was not so good as it used to be and recruitment would be affected.

81,103. He did not think any records were made of inefficient work done by Indian officers, The technical qualifications of such officers did not compare unfavourably with the qualifications of those recruited from Cooper's Hill; it was more a question of character. The work carried out by those recruited in India had been quite as good as the work carried out by men recruited in England.

81,104. (*Sir Theodore Morison.*) The witness said the net military pay of Royal Engineers was as follows:—Second Lieutenant Rs. 60 a month; Lieutenant Rs. 70 a month; Captain Rs. 140; Major Rs. 182-10-0 and Colonel Rs. 243-8-0. A young sapper of three years' service on entering the Railway Service was put on a time-scale with others and started at Rs. 380. If retained in Military Works employment he would receive Rs. 265 and a certain amount of staff pay which brought it up to Rs. 415.

81,105. (*Lord Ronaldshay.*) The witness said he believed officers were obtained now from a different social sphere from that of the officers formerly obtained from Cooper's Hill.

81,106. With reference to pay of Royal Engineers in Civil Employment the whole case was being put before the Royal Commission by an officer appointed to represent it. Military officers had obligations which did not apply to Civil Engineers. He would go so far as to say, from his own point of view, that Civil Engineers who belonged to the reserve of officers, should receive an extra allowance to cover their obligations. A certain number of Royal Engineers were employed in the Traffic Branch; they were recruited in the same way as the Royal Engineers to the Engineering Branch. He could not explain why a Royal Engineer who was employed in the Traffic Branch did not receive the same pay in the administrative grades as a Royal Engineer employed in the Engineering Branch. The only explanation he could give was that when the scales of pay were under revision the Secretary to Government in the Public Works Department dealt with the case of all Railway as well as Public Works Department Engineers and the Railway Board with the case of Traffic Officers, and that in the former case more attention was paid to continuing to officers of a certain standing advantages, as regards exchange compensation, military pay, &c., which they already enjoyed.

81,107. With reference to the difference between the pay on State Railways and the pay on Company Railways, the witness said the Companies paid their Agents Rs. 3,500 and the highest *rate* of pay on a State Railway was Rs. 3,000. The Traffic Managers on the large Company lines received Rs. *2,500* and the Traffic Managers of the State Railways Rs. 2,000; and there was the same difference in the case of the Locomotive Superintendent.

81,108. (*Chairman.*) The witness said the responsibility for the technical specification of Stores rested with the Department using them. Consequently the officer in charge of the Stores did not require any technical knowledge for drawing up the specification, but there were many things bought without specification, and the Storekeeper had to buy those on samples.

(The witness withdrew.)

P. C. YOUNG, ESQ., Executive Engineer, Indian State Railways, [Assistant Secretary, Railway Board (Construction)].

Written Statement relating to the Railway Department.

81,109. I have been asked by the Imperial Engineers in the Railway Department to represent those of them who have not been recruited from Cooper's Hill—my own technical training having been obtained at Cambridge University and on the Caledonian Railway. I am solely responsible, however, for the opinions expressed in the following memorandum, though I believe that they commend themselves to the majority of those who have asked me to represent them.

It may be taken that I endorse the statements and opinions put forward in the written statement prepared by the Civil Engineers' Association" and already submitted to the Royal Commission, though I desire to emphasise or to amplify what has been said in regard to certain matters which particularly affect the Railway Engineer and in regard to others in which *I am personally* specially interested.

81,110. **(I.) Methods of** recruitment.—Although I was not trained in the Royal Indian Engineering College at Cooper's Hill myself, I am of opinion that the abolition of that college was a mistake and that its re-establishment is desirable in the interests of the public service. I believe that, the re-establishment of such a college would be practicable if it were to be recognised as the principal place of recruitment for all departments of Indian State Railways as well as for the' Public Works and Telegraph Departments. No better education can be found for men who are to administer any department of a railway than *a* sound engineering training. All students who passed the qualifying test at the end of the course at such *a* college should be entitled to appointments under Government on probation; the incentive to work hard would be afforded by the fact that the men who passed high on the list would have prior selection of a department, while the practical guarantee of an appointment on probation would attract the best class of recruit, and result in keen competition for entrance into the college. I believe moreover that the re-establishment of such a college is the best means of increasing the number of Indians of suitable qualifications coming forward for appointments on State Railways. This matter is again referred to under paragraph 80,116 below.

81,111. **(II.) Systems of training and probation.**—Whatever method of recruitment is decided upon, I regard a degree in engineering or its equivalent, a year's experience *on* railway construction in Europe or America and a probationary period on Indian State Railways as essential. An engineer appointed on probation should be confirmed in his appointment if thoroughly well reported on at the end of one year. If indifferently or badly reported on in his first year he should be placed under a different officer for his second year. If the earlier report is confirmed his service under Government should cease, but if he is well reported on a third year of probation under a third officer should be given to him, and his further employment should be considered on the results of three independent reports. Particular care should be exercised in selecting the officers under whom probationers are to be placed, especially in cases where an unfavourable report has already been received. It is desirable that, whenever possible, the probationer should be employed on railway construction.

81,112. (III.) Conditions of service.—When I was offered an appointment in the Public Works Department a statement of the conditions of service in that department was forwarded for my perusal. From this statement I was given to understand that promotion from grade to grade would be made entirely by selection. In practice men who are for one reason or another considered unsuitable for the higher posts are superseded. Moreover, engineers are selected for appointment to special appointments, as for example to appointments in the. Agency Department. In my experience, however, I know of no case in which an engineer has been specially selected for permanent promotion to a higher grade. If the senior man is not reported on unfavourably promotion goes to him. Thus as a general rule promotion is obtained merely by effluxion of time. In saying this I desire it to be understood that I do not advance any personal grievance regarding the promotion which I, as an individual, have received. In my opinion, none the less, this is the most unsatisfactory of all the conditions of service, since under the present system Government loses directly by failing in many cases *to* secure the best man for the higher post and indirectly by failing to encourage, as much as it might, effort among the rank and file of the department, while the best men lose advancement to which their ability entitles them, and all members of the service lose in being deprived of a goal for their ambitions. The difficulties in the way of exercising a. stricter selection, when all promotion in a large department is controlled from headquarters, are patent, at the same time I believe that much might be effected if a franker system of reporting were insisted upon, and that much good would result therefrom.

As promotion is for practical purposes controlled by a time-scale, it is manifest that the entry of additional officers at any point *on* the seniority list except the bottom must adversely affect the interests of those already on the list, when the time comes for promotion to divisional charge or administrative rank, the number of such appointments being necessarily limited. I can speak from personal experience of the extremely discouraging effect of such supersession as, since I entered the department, eight* men, all considerably my juniors in years, have joined the department and have been accorded a higher position on the seniority list. I gratefully acknowledge that the hardship in the case of engineers of my own standing has been recognised and redress afforded in the only practical way. At the same time other cases of the same kind have occurred and are the cause of much heartburning. In my view the only satisfactory remedy is a decision that all permanent engineers shall enter the department at the bottom of the list.

The employment of temporary engineers in a department mainly employing permanent engineers is and, so far as I can see, always must be unsatisfactory, more especially from the point of view of the temporary engineers themselves. The number of permanent. engineers actually in the service has for many years been much smaller than the number required to carry on the work of the department and temporary engineers have been employed to make good the deficit. The number of these temporary men has, so far as I can ascertain: never been less than 50 during the last five years. This indicates clearly that the cadre of permanent engineers should be increased very largely. Permanent engineers should be recruited in such numbers that after the elimination of the unfit during the period of probation those remaining can carry on the normal work of the department. Resort should only be had to the appointment of temporary engineers when this is essential to meet the. needs of any temporary increase in the volume of work.

Not only is the total cadre inadequate but in my opinion the number of administrative posts and divisional charges is also insufficient having regard to the work to be done. When the greater part of the capital outlay on railways was incurred on the construction of new lines additional administrative and divisional charges were constituted as a matter of course. Now, when. most of the work consists of open line improvements, the additional work is as a rule supervised by the engineer in charge of maintenance on the district on which the work is situated, additional assistant engineers being posted to the district. In this way the work of the Executive and Superintending Engineer has been unduly increased with resulting. loss of efficiency. In connection with the railway location at present carried out by companies and private firms at the cost of Government. I believe that Government supervising engineers could be employed with profit. I also consider that much of **the** work at present carried out by the

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* *Vide* evidence relating to the Public Works Department. taken in Calcutta, Volume XVI, paragraphs 72,155-63.

* This should be "*six* men"—vide oral examination, para. 81,121.

Agency of Branch Line Companies could with advantage be done by Government engineers.

81,113. (IV.) Conditions **of** salary.—The engineers recruited from Indian State Railways are not merely required for the maintenance of the three State Railways and the construction of new lines pertaining thereto. Practically the whole of the Indian railway system belongs to Government, and the entire working of that system and all expenditure on its extension and improvement is directly controlled by Government. This control is at. present exercised by the Railway Board. Since the Board was constituted five members have been appointed to it. **One** was the Manager of an English railway, the other four were men who had begun their careers as Indian State Railway Engineers. At the present moment, of the Agents of Company worked lines, permanent and officiating, six have been Indian State Railway Engineers. Moreover, the whole of the inspection work which in England devolves upon the Board of Trade is performed by **a** staff **of** State Railway Engineers. In these circumstances it is of first - rate importance to secure the best men available as recruits. It is riot sufficient to attract the best men who have adopted the engineering profession and happen to have no other appointment in view. In my opinion it is necessary that the prospects should be made good enough to induce the parents of promising boys to give them **a** training in engineering with the hope that they inxy receive an appointment on Indian State Railways. I am told that in 1871, when Cooper's Hill was founded, the Secretary of State thought it necessary to advertise £420 as the starting salary in order to attract recruits of the proper stamp. To-day the starting salary is £304. Five years ago when a time-scale was introduced some improvement on the average rate of pay was made, but I do not consider that on the average an engineer's salary to-day is as much in purchasing power as it was ten years ago.

To what is said in the Civil Engineers Association's memorandum regarding the pay of Chief Engineers in the Railway Department I should like to add that in my opinion a minimum pay should be fixed for the officer occupying the position of Engineer-in-Chief on any of the State Railways. In practice the Engineer-in-Chief **of** the North Western Railway is invariably a Chief Engineer. On the other two lines when the substantive pay of the Engineer-in-Chief is less than Rs. 2,000 it should be made up to that figure by the grant of personal allowance.

81,114. (V.) Conditions **of** leave,—In my opinion the present scale of furlough allowances is entirely inadequate and Government is at present losing directly by virtually preventing men from taking the. leave which they require. It would pay Government better to give the allowances which have been asked for than to compel jaded men to remain in harness.

81,115. (VI.) Conditions **of** pension.—The matter of personal pension is fully dealt with in the Civil Engineers Associations' memorandum. Sofar as I know there is not **a** man among State Railway Imperial Engineers who does not consider that under this head he has **a** just cause of complaint. In reply to the last petitions submitted to Government on the subject petitioners were informed that **a** decision in the matte: must await the deliberation of the Royal Commission. The matter had already been the subject of many previous petitions, and in the circumstances it would appear equitable that the benefit of **any** improvement in the present scale should be conceded to those who have been compelled to retire without obtaining any final reply to their petitions.

I desire to amplify what has been said on the subject of family pensions. It is manifestly incumbent on every married man to make provision for his widow and family in the event of his death. If a man has to meet the cost of educating *a* family. which often means maintaining three establishments for one-half of the year and two for the other half, it is in many cases impossible for him to make adequate provision by means of ordinary insurance, and care for the futnre militates against efficiency in the present. I helieve that a remedy can be fonnd which would cost Government nothing. My proposal is that a man within one year after his marriage should have the option of choosing a joint personal and family pension in lien of the personal pension to which the rules entitle him. Assuming that the scale of pensions asked for will be conceded, under the scheme proposed **a** man would cease to be entitled to any pension, unless invalided, before the completion of 25 years' service; after the completion of *26* years' service he would become entitled to **a** personal pension which would ordinarily be between f200 and £250, depending on his own and his wife's age on marriage, instead of £500. In addition to this personal pension an equal sum would become due as **a** pension to the wife from the man's death, or retirement after 23 years during the remainder of her lifetime. For any service which would under the ordinary rules entitle **a** man to **a** sum in excess of £500 by way of pension the man mould be entitled to dram this extra sum as **a** personal pension. The same system can he elaborated to cover family pensions. In order to entitle-children to a pension it would of course be necessary to reduce the pensions of the man and of his wife, the reduction increasing with the number of children. It would be desirable, however, to limit the pension of each of the parents by a fixed minimum, €he aggregate pension payable to children being limited by a corresponding maximum. I have figures in regard to the pensions of **a** man and his wife which may, I believe, be accepted as approximately correct and of which the general result has already been indicated. Data have been lacking for the calculation of children's pensions and the corresponding reduction of parents' pensions; I believe, however, that I shall be able to obtain a rough approximate estimate of the reduction necessary to insure to a son a pension of £100 from his father's death or retirement until the son is 21, and a similar pension of £75 for a daughter until her death or marriage.

81,116. (VII.) Such limitations as may exist in the employment **of** non-Europeans and the working **of** the existing division of services into Imperial and Provincial.—The recruitment of lion-Europeans is at present limited to 10 per cent. of the number of Imperial Engineers recruited in each year *plus* the two Provincial engineers who are recruited for the Railway Department in each year as maxima. I conceive that it must necessarily he the policy of the Government of India to recruit Indian engineers in preference to non - Indian engineers, when Indian engineers can be found who can render equally efficient service to the State at no greater cost. The railways of India are, however, a very large commercial business and a transportiiig agency on mhich the material prosperity of the great majority of the population depends, and it appears to me essential that in the interests of the country as *a* whole it must **be** the primary object of Government to secure that the State Railways of the country fulfil their obligations to the general taxpayer in the most efficient manner. I am of opinion, then, that efficiency should be the only criterion, and that in the case of railway engineers no artificial restriction need be placed upon the employment of non - Europeans as such. If this be accepted the existing division of the service into " Imperial " and " Provincial " appears to be **a** mistake. If **a** branch of the service is given an inferior pay and prospects engineers of inferior attainments should be accepted and mill be accepted as recruits for that branch. Railway engineers are required to construct and maintain railways—in India they are at the same time engineers and contractors. Inevitably large responsibilities are imposed upon them and the necessity for **a** prompt and clear decision frequently arises. There is, therefore. no room among railway engineers in India for any but the best obtainable man The best men should **he** obtained; they should be borne on one cadre and receive the same scale of pay. I do not consider that the rcqnisite standard is likely to be reached by Indians recruited in this: country, except in rare instances. I base this opinion upon the following grounds :—

1. The Indian of the class who is ordinarily in **a** position to secure the necessary general and technical education has no natnral aptitude for the profession of engineering.

2. The best 'technical college training cannot he obtained and the best and most modern engineering practice cannot be seen

3. The Indian who has been educated in this country naturally retains as **a** rule Indian habits of life. The Indians with whom he comes in contact and mith

whom hc associates on railway work are of inferior education and have a comparatively low standard of public opinion. It is difficult for any man who is not of altogether unusual strength of character to prevent himself from being influenced by his associates.

That Indians trained in this country are not as a rule suitable for employment as railway engineers is borne out by the fact that the number employed upon Companies' railways is negligible, while those companies would undoubtedly,employ such Indians if they approached men recruited from home in efficiency, seeing that the former are prepared to accept lower rates of pay. If a larger number of Indians is to be employed as railway engineers it seems to me that the only satisfactory way of obtaining suitable men is to help Indians of ability and good character to secure the best technical education and a training on Railway Construction work in Europe or America. if a special training college for India is reopened scholarships should bc given to that college, failing this scholarships should be given to the leading colleges at Home.

In making this suggestion I do not forget that the cost of these scholarships will be borne by the general taxpayer, as would the cost of employing an inferior man; in my opinion, however, this is the manner in which the number of Indian railway engineers can be increased at least cost, at present and for many years to come.

MR. P. C. YOUNG called end examined.

81,117. (*Chairman.*) The witness said he was an Executive Engineer on the Indian State Railways and represented the Iniperial Engineers who had not been recruited from Cooper's Hill, the number of officers being about twenty-five. He mas trained at Cambridge and on the Caledonian Railway. We gave general assent to the proposals made in the written statement of the Engineers' Association.

81,118. The witness said he endorsed the suggestion that a College on thr model of Cooper's Hill should he revived. From the point of view both of Government service and of the men joining the service he considered a Central Institution to he tlir best. At present a great many of the men were picked up in the open market and were very miserable when they came out to India. It was a general practice to send newly appointed Engineers into the jungle and when they came back to a station they knew nobody. and nobody knew them, or probably wanted to know them. If they had been all trained in one place they would have had friends in the country. Also, on the whole the men who came from Cooper's Hill were better than the men obtained now. *Personally* he did not. lose in technical education by not. having been to Cooper's Hill. It was rather on social grounds that. he advocated the Central College.

81,119. With regard to the employment of Indians, he regarded efficiency as the main criterion for their admission to the Service, and he would break down the present division into Imperial and Provincial and have one Superior Service with a locally recruited Subordinate Service.

81,120. The witness said be did not. suggest. that if a Central College was not established there should be an open competitive examination in England ; he preferred the present nomination system. He thought an Indian could get a better training in England than in India. He had never served under a. Provincial Engineer but he had seen their work a. good deal. particularly during the last three gears while he had been with the Railway Roard. He should say that the work which had been turned out under tho guidance of Provincial **Engineers** was inferior to the work turned out under officers from England.

81,127. The witness was in favour of officers appointed for permanent service coining in at the bottom of the list, whether they were Civilian Engineers recruited in the ordinary way, Royal Engineers, or temporary Engineers. He had known cases of temporary Engineers appointed to the permanent cadre, hut there had not been very many on railways. In that connection there was a mistake in his written statement, which should read that he had been superseded by six men. not by eight. He was a strong advocate for strict selection on merit.

81,132. With reference to pensions and the suggestions put forward in the written statement as to allocating half the pension to the officer and half to his wife. the witness said it would be necessary to reduce the amount that. was divided. as Government would lose considerably if £250 was guaranteed to the officer and £250 to his wife in lien of a personal pension of £500. In many cases it would mean a reduction to less than half for each. Given certain ages for the man and his wife, it would in some cases be £200 and in other cases £250 ; it would vary between those two figures. If the husband predeceased the wife, the latter would enjoy the pension for the rest of her life. He reduced the pension a certain amount in order that the Government should not lose by the transadion where the husband predeceased the wife, and he did not suggest there should he any further liability on Government. At present a widow received absolutely nothing. He did not see how anybody could reasonably refuse to havr the option of dividing his pension in that way. The scheme in a way was an amalgamation of the pension and Family Pension Fund. If a wife predeceased her husband the result might be a serious loss to the officer, but he thought officers would be prepared to endorse the scheme and submit to that loss.

81,183. (*Lord Ronaldshay.*) With regard to promotion, the witness thought the Service, as a whole, would have complete confidence in a selecting authority, which in his opinion should be the Railway Board. There would be dissatisfaction among individual members if junior men wcro picked out for promotion, but it would not affect the morale of the Service as a whole.

81,124. With reference to permanent. Engineers entering at the bottom of the list, there were at present three different kinds of Engineers who entered at different points on the time scale. Temporary Engineers and Royal Engineers entered at points other than the bottom of the list and all Imperial Engineers recruited in England entered at the bottom. There mas no point fixed for a given class, but tho individuals within that class entered at points on the list..according t.o certain rules which governed the entry of Royal Engineers while the entry of temporary Engineers was decided in a very arbitrnry way.

81,125. The witness thought the personnel of the Service would never be entirely satisfactory until it was as pod as could he obtained, and at the present time it was not as good as it had been formerly. It was extremely difficult to analyse the matter and say how much deterioration was due to the inferior prospects of the Service and how much to the method of recruitment. Probably both were contributory causes. In his opinion the Service was not of so high a standard as it ought to he.

81.126. (*Sir Theodore Morison.*) The witness said it was his personal opinion that there was a very great advantage in a man having what might be termed the social position of a gentleman. Like the Engineers in England, tho Engineers in India were proud of having with them men who had risen from the ranks, but in India the officers acted as contractors as well as Engineers and had to control large numbers of labourers, and he thought a gentlemen had a certain address which made his work very much easier for him. In England the work was carried out directly by contractors, their Engineers only doing the setting out. There was more commanding to he done in India than in England.

81,127. With reference to pensions, the witness said he had had the scheme worked out actuarially and he would draw up a set of rules and explanations and submit thein to the Commission with a diagram. If a wife died when her husband was still in the Service, the husband would only receive the split pension. If a wife died the pear after marriage, her husband would only receive the half pension of £200 to £250. He had made a. very arbitrary provision in the calculation for the ease of a. man marrying again and providing that he would get a split pension for himself and his second wife. For instance, if a man would receive $2250 for his first wife and £250 for himself, when he married again he might only receive £200 for himself and the same reduced sum for his second wife, the amount depending on the ages of the man and woman at marriage. Assuming that the ages at the time of the first marriage were such that £200 to each was the pension, and on the second marriage the ages were such that £225 was the pension, the husband and wife would only get £200 each. The scheme was to ensure against leaving a widow without provision.

81,128. (*Mr. Chaubal.*) The witness said that of the twenty-five officers he represented several were not trained at Cambridge, and the average, he thought, were of a lower social status than those who came out from Cooper's Hill.

81,129. With regard to inferior work, the witness said records had been made of it in individual cases but no general statistics had been prepared relating to inefficient work done by any class of men. If bad work was done it was generally condemned at once. Any record of an individual case would invariably mention the officer under whom the work was carried out.

51,130. The actual labourers were generally under a jemadar or foreman: but the superior officer had occasionally very direct connection with the individual coolie.

81,131. (*Mr. Sly.*) With regard to selection of officers, the witness said that at present the rule was that there was strict selection to the Administrative grades, and while he was satisfied generally he thought the rule ought to be more strictly enforced. The rule that for Executive rank there must be a special report that the officer was duly qualified to hold charge of a division was not sufficient, being a mere qualification for promotion to divisional charge, and he wanted to make it a strict selection. If strict selection was insisted upon those who were rejected would stay where they were, and there would no doubt be cases of men who did not rise above the position of Assistant Engineers. If strict selection for promotion to Executive rank was enforced in the Service, he believed as good recruits would be obtained as at present. He thought it might be possible to introduce a scheme for the compulsory retirement of the unfit at the age of forty.

81,132. With regard to the question of supersession of officers, that affected an officer when he was on Rs. 800 as he could not get above that until he had a district. As promotion was by efflux of time, eight men, or whatever the number might be, had to be provided for in districts before he could get a district and the same thing applied to the stages further up.

81,133. (*Mr. Macdonald.*) With regard to nominations in England, the witness believed that an applicant submitted an application to the Secretary of State before a certain date and received from his Professor a certificate of character. He presumed that personal influence was sometimes used but he had no evidence of it. He himself was actually appointed before Cooper's Hill was abolished. His University was asked to nominate a man and he was nominated by the Professor and did nothing more in the matter.

81,134. The witness said he would not confine the training of Indians to England but would include Europe and America. He had no means of knowing what the feelings of the colleges in England was towards Indian students, but if as the result of the Royal Commission's work there were a large number of Indians going to the Universities in England he should think the highest authorities in the Universities would welcome them, though probably the undergraduates would not be quite as pleased. He had heard of cases of Indians having difficulties in obtaining training in England. He believed that if the Secretary of State made himself responsible for obtaining training for Indians the fact that there were a large number of Indians coming forward would be likely to increase its cost. Firms and Railways would be less willing to take Indians and would require a large premium but he had no direct evidence on the matter. The recommendation he had made he believed to be practicable, but he had no idea about the cost. He had heard that it was exceedingly difficult to get an Indian into a Municipal Electrical Works for the purpose of learning the business, and also that it was increasingly difficult for an Indian who had gone through a technical school to get any employment in workshops for training. Therefore he had suggested that the training might be in Europe or America, which would offer a pretty wide field.

81,135. (*Mr. Madge.*) The witness did not consider that seniority was a safe rule for promotion; but it had to be taken into account. He thought the public would have no confidence in seniority as the basis of promotion. Seniority should date from the entrance in the Department whatever a man's age might be at the time, but that was not the case at present. He himself, for instance, joined the service in 1903 and since then six men had joined at points higher up the list than himself, though they were all younger men. They joined under an arbitrary rule made by Government for the appointment of Royal Engineers to the Engineering cadre. The rule was intended to provide that men of the same age should have about an equal standing in the Department, but through some mistake in the calculations or some chance of fortune it did not work in that way and younger Royal Engineers had an advantage over older Civil Engineers. With regard to Railway work, there was an enormous field for the construction of new railways and that was one of the grounds on which he asked for an increase in the cadre.

81,136. The witness said he had seen the work of domiciled Europeans and Anglo-Indians in his Department and had considered their work good.

81,137. (*Mr. Abdur Rahim.*) The witness said that if an Indian Engineer went to a Company and asked for employment he would not stand the same chance of getting it as an Englishman with the same technical qualifications. There was a general presumption in favour of the Englishman and that might account for the non-employment of Indians on company lines.

81,138. (*Sir Murray Hammick.*) The witness said he began as an Assistant Engineer on Railways and had been officiating Executive Engineer since 1906, with the exception of a few months when he reverted to Assistant Engineer. He had been Assistant Manager, or Assistant Agent, for one year and for the last three years Assistant Secretary to the Railway Board. His work in the latter capacity gave him an opportunity of seeing reports as to the result of works, cost, and so on, as he dealt with that branch of the work in the office. Therefore any work that was not efficient would come before him on report.

81,139. With reference to probation in England, the witness said that when he went to the Caledonian Railway he paid nothing and was paid nothing except half-a-crown a day for lunch. He was given a very good opportunity of seeing all the important work that went on and was for a time in charge of the construction of a short line under the Resident Engineer, who lived at headquarters. That opportunity of seeing works was very rarely available for nothing and he was extremely fortunate to get it. He thought, however, it could have been obtained by the payment of a premium. It was not his personal experience that young men who were put on railways got no opportunity of seeing Engineering work. He thought the Caledonian Railway might take a pupil every other year, but not to a large extent. He did not know whether the railway would make any objection to taking an Indian, but he imagined that a man from India would have very great difficulty in understanding what was said to him on the Caledonian Railway for the first year. He was inclined to think that on that account an Indian would be of very little use to the railway, which looked not only to the premium but to whether the pupil would be useful to them.

(The witness withdrew.)

Major W. D. WAGHORN, R.E., Agent, Oudh and Rohilkhand Railway.

Written Statement relating to the Railway Department.

81,140. **General.**—The State Railways under the the Government of India consist of the following branches:—Engineering (including Signalling and Bridge Engineers), Traffic, Locomotive, Carriage and Wagon and Stores Departments. In addition to these there is a small branch for Mining and for Electrical Engineers. The latter though at present treated as a separate branch might with advantages in my opinion be amalgamated under the Chief Mechanical Engineer or Locomotive and Carriage and Wagon Superintendent or under either of these two Officers where these two branches are kept distinct, at any rate until such time as electricity is more generally employed in this country. Officers for employment in the Agency branch are recruited in accordance with the Railway Board's Circular No. 709, dated 2nd October, 1907.

ENGINEERING BRANCH.

Officers in this Branch are at present divided into two services, *viz.*, Imperial and Provincial.

81,141. **(I.) Method of recruitment.**—*Imperial Service.*—The Officers in the Imperial Service are recruited from the following sources:—(*a*) Royal Engineers (up to a maximum number of 50) for employment on Railways or in the Public Works Department; (*b*) Cooper's Hill Engineers, which source of recruitment has ceased since the abolition of that College in 1903; (*c*) By selection of candidates from specified Engineering Colleges at Home by the Secretary of State.

Provincial Service.—The Officers of the Provincial Service are trained in the Indian Colleges and are appointed from thence direct as probationers on State Railways or in the Public Works Department. Prior to 1893 candidates from the Indian Engineering College at Rurki were appointed as Imperial Engineers and there is no doubt that in certain individual instances men of exceptional merit were obtained.

Temporary Engineers.—In addition to the above a large and increasing proportion of Temporary Engineers are being employed. These men are taken on as additional works are sanctioned and the services of an increased number of Engineers are required. They are outside the permanent cadre of the Department and are liable to one month's notice in the event of their services being no longer required. Their conditions are therefore unfavourable and it is hardly likely that good men can be obtained.

Recommendations.—There is a certain amount of truth in the complaint of the Provincial Engineers that they are called upon to do the same work at a lower rate of pay than their brothers in the Imperial Branch and though I do not think that as a body of men they reach as high a standard as the Cooper's Hill men, Royal Engineers of the Imperial Service Engineers recruited under later conditions by the Secretary of State at Home, I do not see why they should not be given a chance of attaining the same high posts and control as is given to Engineers recruited from other sources. In order, however, to allow of this it will be necessary to lay down very distinct and strict rules under which only men of recognised ability will be selected to the administrative grades, and in view of the unsatisfactory conditions which rise if a large number of men at 40 or thereabouts are kept back as Assistant or Executive Engineers owing to their not being qualified for promotion to Administrative posts, rules should be introduced under which men, who, at 40 or after 20 years' service, are considered unfit for promotion to Administrative grades can be forced to retire, a gratuity or bonus being given them on such forced retirement. If these terms are made clear when young men first leave College they will quickly recognise that it is essential that they shall do their utmost to qualify themselves for promotion when the time comes. If a high standard and good work is to be obtained competition must be maintained throughout a man's service or at any rate until he has shown himself thoroughly qualified as the best of his time.

I am personally quite prepared to see Indians appointed in the Department as indeed they are at present, but one wants nothing but the best and to endeavour to raise the standard. It is therefore essential that there shall be a large percentage of Europeans if the Indian recruits are to get the necessary training in character and practical Engineering, both points in which after some 24 years' experience I have generally found them to fail. I have also found that Indian Engineers fail in proper control of their staff. I should therefore limit the appointments to recruits from Engineering Colleges in this country to 20 or 25 per cent. of the total requirements. I do not lay great stress on the course of training which is undergone in the Engineering Colleges in India and am of opinion that the knowledge gained by two years' practical experience in this country is worth more than all the College training but I do lay very great stress on the necessity for having a very high class of Officer with the highest ideals. If an individual officer is anxious to improve himself he can with advantage visit works and shops when on leave in England or elsewhere later on and can no doubt pick up a very large amount of useful knowledge.

I object to the undue employment of Temporary Engineers as their conditions are so unsatisfactory that it is very difficult to obtain a really good man and if one does happen to get hold of a good man he is always on the look out for a better job, they should therefore in my opinion only be employed on purely temporary works.

I also object to the promotion of subordinate officials as Officers as they are particularly devoid of the characteristics which I consider essential in a good officer.

81,142. **(II.) Systems of training and probation.**—I consider it would be most advantageous to reconstitute the Royal Indian Engineering College at Cooper's Hill for the recruitment and training of Officers of all Departments for employment on State Railways but on a more extensive scale than the original Royal Indian Engineering College. Opportunity should there be given for watching and training candidates which is not obtainable when Officers are recruited as at present from the various Engineering Colleges at Home.

Under the present system of selection of candidates for the Imperial Services some extremely able men have no doubt been obtained, men who will in due course make their mark, but a large proportion of them have not those qualities which are in my opinion essential in this country and it is on these grounds that I would recommend the reintroduction of a Central Training College for Imperial Engineers at Home with a course of two years' instruction and one year spent on a practical course.

I would similarly make Rurki the Central Training School for Engineers in this country but would as already stated grant only 20 to 25 per cent. of the appointments in Railways to Engineers thus trained in this country. The course at this College, I would suggest should be similar to that in England, namely, two years at the College and one year on practical work which in the case of these candidates I would suggest should be put in on large and important works in India. I do not believe in sending an Indian to England at this age in order to learn practical work. He can be taught practical work almost equally well in this country and there is less likelihood of upsetting his character in this country than if he goes Home.

81,143. **(III.) Conditions of service.**—The pay of all Engineers whether recruited in England or in India should be the same where their liabilities and employment are the same and they should all be equally liable to be turned out of the Department if they prove unsatisfactory and unfit for promotion to Administrative grades after 20 years' service or of 40 years of age. In fact it would I think, be advisable to make all Engineers liable to be turned out after 10 years' service or at 30 years of age if they are not proving satisfactory. These rules will, however, be useless unless strictly adherred to.

81,144 **(IV.) Conditions of salary.**—The scale of salaries for all Imperial Engineers should be made the same as the present scale of pay for Imperial Engineers sanctioned by the Secretary of State for India in 1908 appears at present adequate.

81,145. **(V.) Conditions of leave.**—With certain minor modifications these appear to be suitable and should be made applicable to officers whether recruited in England or in India.

One minor modification I would suggest is that privilege leave should be a recognised leave and should not lapse, that is to say, if for any reason an Officer is unable to take privilege leave when due he should be allowed to accumulate the balance though it need not be permissible to grant more than 3 months' privilege leave at any one time.

In the case of the Indian appointed from Rurki who would probably wish to spend their leave or furlough in India, their allowances should be calculated on the same basis as Europeans but taking the rupee at 1*s*. 4*d*. they would be paid only ⅔rds of pay which they will draw if the leave was spent at Home.

81,146. **(VI.) Conditions of pension.**—Pension rules should be made the same for candidates appointed in India and in England. Pensions paid to Indians in this country should be based as above on ⅔rds of the English rate of pension. The difference in cost of living and the rate of Exchange between the two countries in my opinion justifies this variation. For Officers retiring after the age of 40, the scale of pension at present awarded should be increased, special pensions should be granted to Officers who have served for 3 years as Chief Engineer or Agent of a line up to a maximum of £700 a year and in the case of Officers who have served 3 years as Superintending Engineers up to a maximum of £600 a year.

81,147. **(VII.) Limitations in the employment of non-Europeans.**—As regarding limitations existing in the employment of non-Europeans the fact that Imperial Service Engineers are no longer appointed from the Colleges in this country is so far as I am aware the only limitation. It should be possible, by giving a certain number of appointments from Rurki annually in the Imperial Service, to do away with this limitation but I do not consider, in the present state of development of this country and having regard to the characteristics of Indians generally, that it will be advisable to open more than 20 to 25 per cent. of these appointments to candidates trained in this country. It will be necessary to give 3 to 5 years' notice before the introduction of such a proposal, however, as the present class of recruits that pass out of Rurki College are not up to the standard that used to exist prior to 1903, nor would it be fair to appoint them suddenly to the Imperial Service Branch whilst similarly trained men of a few years seniority remain in the Provincial Service.

TRAFFIC DEPARTMENT.

81,148. **(I.) Method of recruitment.**—This Department is recruited by:—

(i) Selection and nomination by the Secretary of State in England.

(ii) Selection and nomination in India by the Railway Board.

Candidates selected in England are, so far as I am aware, not required to pass any competitive examination but are selected on general reports as to qualifications and character and after having passed through a course of practical training in traffic working on some English Railway. The same applies as regards the selection of candidates in this country with the exception that they are not in this country required to go through a course of practical training until they are appointed on probation.

81,149. **(II.) System of training and probation.**—These methods have whatever their drawbacks may be, undoubtedly led to a very great improvement in the standard of traffic Officers on the Indian State Railways of recent years but I consider it advisable that Officers for the Traffic Department should be trained in some Central College as in the case of the Engineering Department. Their course of training would consist of somewhat different subjects to that for Engineer students but they would enter the College only by competitive examination and on passing out would be carefully selected in regard to character and sent for one year's practical training in Traffic working on an English Railway. A similar procedure should be introduced for candidates trained at a Central Indian College and for these some 20 per cent. of the appointments on Indian State Railways might be reserved.

81,150. **(III.) Conditions of service.**—The conditions of service in each class should be the same but subject to the same qualifications as in the case of Engineers (see paragraph 81,143).

81,151. **(IV.) Conditions of salary, (V.) Conditions of leave, (VI.) Conditions of pension, (VII.) Limitation of employment to non-Europeans.**—My remarks in the case of Engineers apply equally in the case of candidates for the Traffic Department (see paragraphs 81,144–47).

LOCOMOTIVE AND CARRIAGE AND WAGON DEPARTMENT.

81,152. **(II.) Systems of training and probation.**—In the case of Officers recruited for these Departments I consider that course of two years' training Central College at Home as proposed in the case of Engineers and Traffic candidates would be most beneficial. In the case of these Officers I would suggest a three years' course of training in shops at Home, instead of the one year's practical course proposed for Engineers and Traffic candidates; two years of their course should count as Indian service in order to place them on a similar footing with their Engineer and Traffic contemporaries. In the case of the Locomotive Department it would I think be premature to recommend a similar course in a Central Indian College for the reason that the same possibilities in regard to practical training do not exist and secondly that my experience of Europeans brought up in this country and of Indians leads me to the opinion that the nature of work and the requisite course of training in this Branch does not appeal to this class and that even if openings can be given to them only a very inferior class of candidate would be forthcoming.

81,153. **(III.) Condition of service.**—As regards the conditions of service, salary, etc., my remarks in regard to the Engineering and Traffic Branches apply equally in this case (see paragraph 81,143).

STORES DEPARTMENT.

81,154. **(I.) Method of recruitment.**—It is I consider very advisable that there should be some more regular method of recruitment of Officers for this Department. At present selections are made for appointments to this Branch by the Railway Board but without in my opinion sufficient consideration as to the character and educational qualifications of the candidates themselves and the result is that the selection of Officers for appointments in this very important branch of railway working is anything but satisfactory.

81,155. **(II.) Conditions of salary.**—I would therefore suggest that the scale of pay of this Department be improved and that it should be brought up to a standard comparable with the other Superior Revenue Branches of Indian State Railways and that the selection of candidates should be made by competitive examination and after a training through a Central College as in the case of other Branches. It might be possible to open this Branch also to the extent of 20 to 25 per cent. of the vacancies only to candidates from some central Indian College in this country.

Major W. D. Waghorn called and examined.

81,156. (*Chairman.*) The witness said he was the Agent of the Oudh and Rohilkhand Railway, and had occupied that position since last July. Before that he officiated as Agent for the North-Western Railway for about a year. He had been nearly twenty-five years in the Railway Department.

81,157. With regard to limiting the appointment of recruits from Engineering Colleges in England to 20 or 25 per cent., the witness thought that was as many as could be obtained. He admitted it was a considerable decrease on what had been sanctioned, and if the men were forthcoming it might be increased later on; but he did not think more than this number of qualified men could be obtained at present.

81,158. In connection with the proposal to reconstitute the Engineering College at Cooper's Hill, the witness did not think there should be more entrants at the College than there were appointments, and thought it was advisable to have a competitive examination for entrants. He considered it was preferable not to admit Natives of India to be trained in England because he believed in India they had a better chance of knowing better where they were. In England they were apt to lose sight of their nationality and various other things. That view was based on certain experience of Natives trained in India who had qualities which they would have lost had they been trained in England. The witness did not lay very great stress on the actual training at Rurki, as he believed that the experience obtained on practical work was of far greater importance than the training obtaining in a College. The theoretical training at Rurki was quite good enough as a foundation and he had met on Indian Railways some excellent Engineers turned out by the College. He was satisfied with the training now existing in India, and he thought it was sufficient to train men efficiently for the superior ranks of the Service.

81,159. The witness was in favour of paying all alike, and would abolish the division into Imperial and Provincial Branches. He had considered the question of exile allowance to Europeans in connection with furlough and leave allowance, but did not consider it necessary in connection with pay,

81,160. With regard to a European being paid practically 50 per cent. more pension than an Indian-recruited Officer, the witness based that recommendation on the ground that the cost of living and the rate of exchange made it equitable. While living in India the pap should be the same, but when a European resided in Europe the expenses were greater because on the whole it was cheaper for a European to live in India than in England. He did not suggest that the pension should be more than £700 a year and he considered the present rules quite fair.

81,161. The officers of the Traffic Department had to go through a practical course and in some cases had had Traffic experience before coming out to India. Although selection might be made upon an educational basis there was always a need for practical experience in Railway working. The witness said he was not aware that it was intended that 40 per cent. of Traffic officers should be recruited in India, and admitted that the proportion suggested by him, 20 per cent.. was a very material decrease. It was a question however as to whether a sufficient number of suitable men would be forthcoming and also whether they would be fitted to hold administrative posts when the time came.

81,162. With regard to the Locomotive and Carriage and Wagon Department, he suggested a five years' course in England. He had no reason to be dissatisfied with the present material obtained, but be thought it mould be better to have them trained at a Central College, and the Carriage and Wagon men would certainly be greatly improved by such training. He did not think three years was too long for such a practical course.

81,163. The Stores Department was recruited entirely in India at present, and he proposed that in future 20 to 25 per cent. only should be recruited in India, the remainder coming from England. He suggested that officers of the Department should go through a two pears' course at College in order that they might obtain that general training which he believed was very necessary for the work. He preferred to see the Department with a recruitment of its own, not from Engineers or any other Branch. A better stamp of man was required than was at present in the Stores, but they should be recruited for Stores work. Engineers would make very good Storekeepers but it would be a pity to recruit a man for five years and then send him back again to his Department.

81,164. The witness considered that on military grounds it was necessary to find employment for a certain number? of Royal Engineers, and the training on Railways was about as good a training as they could get. They had to handle men and works and take responsibility.

81,165. As to temporary Engineers, the witness suggested that they should be abolished except for purely temporary work, and he would increase the cadre of the Service to the necessary number by adding Assistant Engineers. He did not think that would bring about a block in promotion, as the number of Executive posts would require to be increased very shortly. Also it was inadvisable to keep a man who was unfit for promotion to the administrative grades after a certain age. He had suggested it should be optional for the Government to say after twenty years that they did not require a man's service any longer and send him away with a bonus, which he preferred to a very much reduced pension. He did not think it would be difficult to carry out such a provision and it should be for the Government to say whether the man was unfit. He did not think that members of the subordinate Service made suitable officers as a rule, and they certainly should not rise beyond the Assistant Engineers' grade.

81,166. With reference to an increase of administrative charges, the witness said he considered work on the Railways was getting more complicated and would have to be broken up, and consequently there would have to be an increase. He did not think there would be any serious block if a good many of the posts of temporary Engineers were filled by permanent men.

81,167. (*Sir Murray Hammick.*) The witness reiterated his belief that it was very doubtful if more than 25 per cent. of suitable men could be obtained from the Colleges in India. He did not think the men who were at present getting into the Provincial Service and doing the same work as the Imperial Service men were suitable for the Imperial Service as a whole. The theoretical training at Rurki was good nough for the Imperial Service, but the material that went to Rurki now-a-days was unsatisfactory, probably because men had not been offered a good enough career. There were very good men at Rurki when appointments were given to them in the Imperial Service. If there was 25 per cent. direct recruitment to the Imperial Service a better material would be obtained at Rurki which would enable the 25 per cent. to be supplied, but not much more was possible at present. He was thinking chiefly of Europeans and Anglo-Indians There was a tendency amongst people in this country to send their sons to England to try for the Indian Civil Service or other Services

81,168 With regard to the comparative cheapness of living in England as compared with India, the witness said he had made the necessary allowance for the fact that a man might have a family to keep in England; he considered that a man was able to live better in India than in England although he might have to keep up a home in England. He did not suggest it was cheaper for a man to live in India and keep up a house in England than it was for him to live altogether in England. If a man had boys to educate in England they would be a source of expense to him for eight or ten years. but taking his career all round for thirty gears in India he thought his living would be generally cheaper.

81,169. The witness considered it necessary that a certain European element should be retained on the Railways. not only for the security of the country but for training and improvement of the Railway cadre.

81,170. (*Mr Abdur Rahim.*) The witness considered that the training in India should be on the same footing as the training in England if his proposal for a Central Indian College was alopted. At different times one College might be better than the other. He thought as good a practical training could be obtained in India as that given in England because there were many extensive works in India He should prefer to send Indians, Anglo-Indians, and Europeans, who had been through the course at Rurki to England after eight or ten years' service if they were well reported on and it was thought likely that they would benefit by any special work they would see in England. Every encouragement should be given to them to do special work in their own time in India but after eight or ten years they might obtain permission to go to England on two-thirds of their pay for purposes of studying Engineering works He would not make it a universal rule as at the end of eight or ten years there might be some men who would not benefit at all from such a procedure.

81,171. The witness considered a certain percentage of Englishmen in the Railway Service to be essential. He had no objection, if it were considered advisable, to opening Cooper's Hill or a Central Institution to Indians, but preferred to train the Indians in India and then send them to obtain experience later on in England. There were very few Indians now trained in England. When Indians were sent to England at a susceptible age they were apt to imbibe qualities which were not desirable.

81,172. (*Mr. Madge.*) The witness said Temporary Engineers had been discharged on a month's notice when work had been closed down. If there were 20 or 30 temporary Engineers and half of them had to go, the men whose work was most unsatisfactory would be sent away. There had been questions of men being dimissed for bad work but they would be a small proportion of the whole number. On the whole their work had not been as efficient as it should be and he was desirous of getting permanent Engineers to do the work. The term "efficient" or "inefficient" of course was a matter of degree. They were practically all on a lower plane than the permanent service men, except one or two who had shown certain qualities. They were in some cases hard working and practical men. Very few of them had been promoted. In certain cases proposals to retain good men had been submitted to the Secretary of State but he had overruled them.

81,173. The witness considered there was a great deal of construction work still to be done in India and said that was the reason for increasing the number of high class Engineers in permanent appointments. Other Engineering Works in connection with improvements to existing lines, were also required as the density of traffic was increasing very much

81,174. (*Mr. Sly.*) With regard to the proposal to vary the leave and pension rules as between men recruited in England and Indians, the witness said that he was looking at the matter in sterling, and he thought that if an Indian went to England his furlough pay should be equivalent to two-thirds, taking the rupee at 1*s*. 4d. He would fix the furlough allowance in sterling and give two-thirds of it to the officer who remained in India at 1*s*. 4*d*.

81,175. (*Mr. Chaubal.*) The witness said he had had some experience of five or six officers of pure Asiatic blood, and up to a certain stage a number of them were capable officers. As none of those appointed of recent years had been put into administrative charges they would not have yet had an opportunity of showing all the qualities they possessed, and therefore it might be taken that the Indian of pure Asiatic blood had not been tried as far as Railway Engineering was concerned. There were, however, appointments from Rurki long before 1903 of Indians of pure Asiatic blood who had not shown the requisite qualities. In Railway work a great deal of initiative was required, promptness in action, and quickness of judgment, and his experience showed him that the European had those qualities to a greater extent than the Indian. A Railway might become broken up as a result of riots or rows and there might be disturbances on the Frontier, and to repair that line quickly and deal with the circumstances he thought the European would be better than the Indian. By general security of the country he meant security of the country from attack from outside or from internal disorder. Under such circumstances, a less efficient Engineer would hold up his hands and ask what to do.

81,176. (*Lord Ronaldshay.*) The witness said that only a limited number of appointments were given to Rurki and a number of students there did not go into Government Service. The Rurki students who now competed for Government Service were the best of the students which the College turned out.

81,177. With regard to the work of the temporary Engineer the witness stated that the work now done by them was largely done by contract, but it was necessary to have an Engineer to supervise the contractor. The temporary Engineer was employed owing to the insufficient number of permanent Engineers in the cadre.

(The witness withdrew.)

L. F. JACKSON, ESQ., Executive Engineer, Oudh and Rohilkhand Railway.

Written Statement relating to the Railway Department.

81,178. **(I.) Methods of recruitment.**—The superior posts of the department are recruited in five ways, *viz.* :—

(i) By Civil Engineers obtained from England.

(ii) By the appointment of Royal Engineers.

(iii) By the appointment of successful candidates *from* the Indian Engineering Colleges.

(iv) By the appointment of Temporary Engineers, howsoever secured, that is, whether from England or in India.

(v) By the promotion of selected officers from the subordinate grades of the Public Works Department.

Recruits from England are appointed by a selection committee at the India Office without competition. The annual recruitment from this source has varied. The number of recruits during a series of years (*vide* the reply given to a question in the House of Commons on the 19th April 1911) was as follows:—

1908	39	recruits.
1909	30	,,
1910	30	,,
1911	28	,,

The annual recruitment in India is approximately fourteen, *viz.*, nine from the successful candidates of the Indian Colleges and five from selected subordinates. The proportion of recruits from England and from Indian Engineering institutions, excluding promoted subordinates, is thus approximately thirty to nine. That is to say, only 20 per cent. of the total annual recruitment is obtained from the Indian Colleges and 70 per cent. from England. The remaining 10 per cent. is obtained by selection from the subordinate *grades.* In other words, 70 per cent. of the total annual recruitment is made by selection and only 20 per cent. by open competition. This proportion of recruitment from the Indian Colleges, which, be it remembered, are institutions maintained at great cost to the State, is thus very small as compared with that from England.

The proportion of recruitment should be contrasted with the position existing at the time of the Public Service Commission of 1886-87 and with recommendation of that Commission. It will be noticed (*vide* page 362 of Appendix O, of the appendices to the report of that body) that the annual recruitment from England and from the Indian Colleges was at that time in the proportion of twenty-one to nine, that is to say, the Indian Colleges received 30 per cent. of the total annual appointments. It is therefore manifest that, notwithstanding the fact that the said Committee recommended a gradual increase in the number of annual appointments to be given to the Indian Colleges by reducing the English recruitment, the reverse has in fact transpired.

It is asserted that the legitimate aspirations of the public in India cannot be satisfied unless a greater proportion of the superior appointments in the Public Works Department are reserved for competition in this country. It is suggested as a suitable remedy that at least 50 per cent. of the total annual recruitment be made in India at present, and that this proportion should be gradually increased as conditions change.

Again, as regards the system of recruitment in England, the method of selection at present in vogue is decidedly faulty and should be discarded for a system of open and unrestricted competition, and there should be. no racial limit whatsoever. This system already prevails in India, and the only alteration suggested is the institution of a Central Imperial Engineering College in place of the four existing Provincial Colleges.

81,179. **(II.) Systems of training and probation.**—*Training of men recruited from England.*—There is no guarantee that the preliminary training obtained by these recruits is such as to meet the requirements of the profession in India. The training should be specially directed to one end, *viz.*, the efficient performance of the duties required of an Engineer in India. This can only be secured by competitive examination in which the subjects must be specially chosen and should include one Indian language. The competition must be real, that is to say, the number of appointments offered must not in any year exceed a fixed proportion of the competing candidates. A suitable arrangement would be that the appointments offered in any year should not exceed one-third of the number of candidates in that year. The suggestion is by no means unfair when considered with the conditions frequently prevailing in the Indian Engineering Colleges. For example, it has happened at Roorkee College that one hundred and twenty-five candidates have competed for five or six appointments. Again, at the Poona College, it has frequently happened that no less than forty to fifty candidates have competed for one single appointment.

Training of men recruited from the Indian Engineering College.—The training imparted in these institutions is, it is considered, sound and fairly exhaustive. This fact has been admitted by several eminent persons, such as Lord MacDonnell and Sir J. P. Hewett. Again, this training is directed wholly to the requirements in India. It is therefore submitted that from the point of view of Indian requirements the training received by Indian College Engineers is, in fact, superior to that received on the average by Engineers obtained from England in that, the Indian College recruit possesses the great advantage of receiving his training in the country in which he has to practice his profession and knows the country and the language.

Probation.—The training received by the *alumni* of the Indian Engineering Colleges is further supplemented by a period of training on probation for one year in the department, which is not the case with recruits obtained from England. This probationary period in the department is absolutely necessary and should be insisted upon as an indispensable condition, and it should in addition be a probationary period in the strictest sense, involving selection and the possibility of rejection at the end of it. Any plea that this is unfair or will deter candidates from England by reason of the attached risk may be met by the provision of free return passages to rejected probationers. This, except for the free passage, is exactly what prevails at the present moment in the case of recruits from Rurki College.

81,180. **(III.) Conditions of service.**—The conditions of service of recruits appointed in England and India differ very considerably, and this is the chief cause of the great discontent which prevails among the latter class of officers throughout India. Notwithstanding the fact that both classes of officers are recruited for and are required to do exactly the same work and bear the same responsibilities, the position of officers recruited in England is more favourable in every respect as compared with officers recruited in India.

The policy which has in fact prevailed since the date when effect was given to the recommendations of the Public Service Commission of 1886-87 has undoubtedly been one of monopoly and exclusion, and consistently adverse to the interests of the Indian-trained element. The position thus created is absolutely illogical and unjust and cannot, in view of the surrounding circumstances, be supported. Prior to the Public Service Commission of 1886-87 there was no distinction in the Public Works Department between officers recruited in India and in England, and it is a fact that of all the branches of the public service in which the Indian-recruited and imported elements were formerly on an equal footing, the Public Works Department was the only one in which a differentiation was introduced. No such change whatever was introduced in other branches of the public service, *e.g.*, the Account, Traffic, Finance, etc., in which exactly similar conditions prevailed, *i.e.*, in which all officers, whether recruited in England or India, were on a full equality. This not only dispossessed the public of the only sources, in India, of recruitment to the public service on an equality with officers from England by free and open competition, but it also created an invidious and unjust distinction between men born, domiciled, educated, and recruited in this land. By retaining the former conditions in the case of these said other services, and introducing this adverse change in the case of the *alumni* of Indian Engineering Colleges the result has been that recruits entering these other services have secured vastly better conditions than recruits entering the public service through these said engineering institutions.

Again, while this great distinction was created in respect to the pick of the Indian Engineering Colleges, *i.e.*, those securing the appointments offered, outclassed men from the self-same colleges have been differently treated. The facts and arguments in connection with this particular matter which are of the utmost importance as they vitiate this whole idea of differential treatment, refer to the case of certain temporary engineers, all Rurki men, who many years after this distinction between officers recruited in England and in India had been created, were recruited to the permanent establishment of the Public Works Department and placed not in the Provincial Service but on a level with officers recruited from England in the Imperial Service.

The deep significance of this will be more readily and forcibly recognized when the following facts are digested:—

(i) These officers with one single exception passed out of Rurki College after the Commission had discovered that this institution did not afford a training equal to that obtained in England.

(ii) They had failed to secure guaranteed appointments when competing for them and had consequently no claim to this special treatment.

(iii) The majority of them had failed to secure the necessary percentage of marks (viz., 66 per cent.) required in order to qualify for Government appointments, and were, therefore, not eligible under the rules of the institution, which trained them, for permanent appointments at all. That is to say, they could not, with the percentage of marks obtained by them, have obtained guaranteed appointments even if they had in fact headed the examination lists in their respective years.

(iv) Three of these officers, viz., Messrs. W. C. Cooper, C. H. A. Muller and E. S. Christie, were specially barred from being appointed to the Imperial Service under paragraph 11 of resolution No. 2112-G. of 1892, because they were actually undergoing training in Rurki College on the date of the said resolution and failed to secure guaranteed appointments allotted by resolution No. 1443-G. of 1884. In their case, therefore, the Provincial Engineer Service took effect from the 19th July 1892. That is to say, that, even ignoring the disqualification stated in (iii) above, they were only eligible for the Provincial Service.

(v) In one case (the name can be stated if required) the officer failed to qualify absolutely in Rurki College and took up an appointment in the service of the State as a temporary sub-overseer on the Rajputana-Malwa Railway. He was subsequently engaged in a subordinate capacity as a temporary Sub-Engineer in the Punjab, and later appointed as a temporary Engineer, from whence he was translated to the Imperial Engineer service. This is, therefore, a case where an unqualified person has risen from the lowest rung of the ladder to the Imperial Service long after the Provincial Engineer Service was established, and this should be contrasted with the treatment accorded to the pick of the Indian Colleges against whom the door to similar advancement is absolutely banged and barred.

It stands revealed, therefore, that the Government have virtually admitted that Engineers trained in India, even subsequent to the Commission's findings, are not inferior to men recruited in England, and that they are fully qualified to be placed on an equality with the latter, that is, in the Imperial Service. If this applies to men who are outclassed in Rurki College, it must likewise apply with greater force to others who, as stated above, are the pick of the Indian Colleges but who are placed in the Provincial Service.

It is contended, without fear of contradiction, that in respect to this matter of equality with recruits from England in the Public Works Department it is not permissible to admit outclassed persons on the one hand and to bar the pick of the Indian institutions on the other. It is, therefore, submitted that there should be absolutely no distinction whatever between Engineers recruited in England and in India.

81,181. (IV.) Conditions of salary.—The pay of the Indian-recruited element is approximately two-thirds that granted to officers recruited from England. This is utterly unfair and unsuitable. The resulting anomalies and defects are as follows:—

(i) The minimum pay of Indian-trained Executive Engineers is much less than the maximum pay of Imperial Assistant Engineers.

(ii) The minimum pay of Indian-trained Superintending Engineers is less than the maximum pay of Imperial Executive Engineers.

(iii) Anomalies exist in connection with local allowances as stated below.

(iv) Generally the pay granted to the Indian-trained element is inadequate and is not commensurate with their work and responsibilities.

It is thus clear that Indian-trained Engineers will receive less pay than their own subordinates. This position is untenable. It is maintained that the Engineer recruited from England is entitled to a salary 50 per cent. higher than that paid to his contemporary recruited in India for the following reasons.—

(i) The Imperial Engineer is working as an exile in a foreign country at great inconvenience and discomfort to himself and family. The principle implied is that imported labour expects higher wages than local labour, but no economist imports labour when local labour is available. Also the principle is only applied to India, as no Colonial Secretary would insist on the Indian in South Africa being paid 1½ times as much as the Boer, or the Englishman being paid 1½ times as much as the Canadian or Australian doing the same work in Canada or Australia.

(ii) The mode of life of the Engineers recruited in England is more expensive than of those recruited in India. This is more apparent than real. The European domiciled in this country, who holds this position,has precisely the same expenses and the Indian Engineer has adopted the European mode of life either wholly or to a great extent; though he has not given up the joint family system and the various expensive social and religious customs peculiar to India and which absorb a considerable portion of his income. It is maintained that though the channels of *legitimate* expenditure vary, it is absolutely erroneous to suppose that the expenses of the Imperial and Provincial Engineer differ appreciably.

(iii) The employer is at liberty to offer a higher pay to a special class of men imported from England and a lower pay to the men recruited locally. This view, though expressed by a high-placed Government Official, is untenable, if there is no difference in the standard of professional attainments. The employer in this case is not an individual but a Government, from which its subjects expect justice, and the view expressed is not in accordance with the repeated pledges given to its Indian subject by this Government in *(a)* the Government of India Act of **1833,** (*b*) the Queen's Proclamation of 1858, and (e) the appointment of this Royal Commission to enquire into the condition of the various grievances.

(iv) The Engineer recruited in England is better qualified professionally and is more up-to-date in his attainments than the men recruited in India. Distinguished persons, most capable of judging on this point, have recently declared in public speeches that at least one Indian College, that at Rurki, trains its men to a standard equal to that attained in any College in England (see *also* paragraph 81,184).

It is contended that emoluments should depend on services rendered, and that the distinction between the two classes of officers who do the same work should be obliterated.

Local allowances.—Here Indian-trained Engineers receive two-thirds the local allowances granted to officers obtained from England. This difference is unjust, for the said allowances are always given for a specific purpose, that is, as compensation for local disabilities which equally affect both classes of officers.

Probation period.—Not only have Indian-trained officers, as already explained, to undergo a probationary period and thereby incur the consequent risk of rejection, but even after completing such probation the period so spent is not counted for increments and promotion. This causes great inequality between the two classes of officers.

It is contended that there should be absolutely no distinction whatever in the matter of emoluments of whatever nature of the two classes of officers but that emoluments should depend solely on services rendered and not on place of recruitment.

51,182. (V.) Conditions of leave.—Here, again, there is much disparity between the conditions prevailing as regards both these classes of officers. Great stress has been laid on the advantage to be derived by an Engineer in visiting works in foreign countries, and the Imperial element of the department has received undue credit on this account'. Unless the conditions of leave are the same, it becomes impossible for Indian-trained men, even if they desire to do so, to secure the same advantages in this direction as English-recruited Engineers. Again, the nature of an Officer's duties in the Public Works Department involves continued exposure and discomfort for long periods, and the health of Indian-trained officers suffers equally with that of imported men. There is therefore no reason whatever to perpetuate the present distinction. Indian College Engineers should therefore receive exactly the same leave conditions as their contemporaries recruited in England. It is generally recognized that Indian-recruited Engineers break down in health earlier than men obtained from England, and this is due to insufficient leave. Again, officers recruited in India in certain other services—. for example, the Traffic, Accounts, Opium, Finance, etc.—are under the same leave rules, as the Imperial Engineers, and there is no reason why Indian-trained Engineers should not be on an equal footing with the Indian-trained recruit of these other services.

81,183. (VI.) Conditions of pension.—Here, again, there is a much resented distinction (*vide* article **636,** Civil Service Regulations) which will create invidious and unjust anomalies. For example, an Indian-trained Chief Engineer will draw less pension than his own subordinates recruited from England. It is submitted that it is a well and universally established principle that pensions are granted as a retiring provision for specific services rendered to the State, and it is therefore illogical and unjust to create or maintain any distinction in this direction between persons who have in fact rendered exactly the same services. In other words, pensions ought to be wholly and solely dependent on specific services rendered, and not on place of original recruitment, for this does not involve any special merit.

The Pensions granted at present are altogether inadequate and it is recommended that they be increased in accordance with the following scale:—

Years of Completed Service.	Scale of Pension (proportion of average emoluments).	Maximum Annual Pension Allowed.	
		If drawn in England.	If drawn in India.
		£ s. d.	Rs.
10	$\frac{20}{60}$ths	133 6 8	2,000
11	$\frac{21}{60}$ths	146 13 4	2,200
12	$\frac{22}{60}$ths	160 0 0	2,400
13	$\frac{23}{60}$ths	173 6 8	2,600
14	$\frac{24}{60}$ths	186 13 4	2.800
15	$\frac{25}{60}$ths	200 0 0	3,000
16	$\frac{26}{60}$ths	230 0 0	3,450
17	$\frac{27}{60}$ths	260 0 0	3,900
18	$\frac{28}{60}$ths	290 0 0	4,350
19	$\frac{29}{60}$ths	320 0 0	4,800
20	$\frac{30}{60}$ths	350 0 0	5,250
21		380 0 0	8,700
22		410 0 0	6,150
23		440 0 0	6,600
24		470 0 0	7,050
25		500 0 0	7,500
26		540 0 0	8,100
27		580 0 0	8,700
28		620 0 0	9,300
29		660 0 0	9,900
30		700 0 0	10,500

Moreover it is an accepted principle that Pension is deferred pay (*i.e.*) that men in service subscribe with Government towards an annuity. It is therefore strongly urged that in the case of a man dying in service half the pension earned by him at the time of his death according to the scale above should be commuted into a lump sum and paid to his family or heirs instead of accruing to Government as is the case at present.

The following points bear on the question:—

i. If the Government did not grant pensions the additional salaries instead of being paid to Government for annuities could be put into insurances the benefit of which would not only be enjoyed by the men themselves but by their families.

ii. It is proposed that nothing should be granted to men dying before completing 10 years' service or shortly after taking pension but only to those who die in active service of between 10 and 30 years. The subscription of the former would accrue to Government as at present.

iii. The principle has been more or less adopted as Provident Funds and Bonuses by Government in the case of the Superior and Subordinate Revenue Establishment of State Railways, also by most Commercial and Banking Houses and Companies Railways in India and England.

81,184. **(VII.a) Limitations in employment of non-Europeans.**—As urged above, the department should be recruited half from England and half from India for the present. The recruitment in England should be open to all British subjects equally, irrespective of domicile, caste, colour or creed.

Latterly during the existence of Cooper's Hill only *two* Indians were annually eligible for appointment even after competition, and at present the number of Indians eligible for appointment is limited to 10 per cent. of the total annual recruitment.

Limitations of this nature should be barred.

81,185. **(VII.b) Working of the existing system of division of services in the Public Works Department into Imperial and Provincial.**—The division of the Public Works Department into Imperial and Provincial sections has been anything but a success, and can never be so in view of the surrounding circumstances and of the past history of the department. The distinction thus created between the two classes of officers is intensely resented, and will inevitably result in splitting up the whole Public Works Department into two hostile camps and this must greatly injure efficiency. The interests of the two classes of officers are now widely divergent, and the general feeling of *esprit de corps* which formerly prevailed has ceased to exist. In its place there will assuredly spring up a deep and widespread feeling of suspicion and distrust between the two classes of officers, which must wreck harmonious working. Any differentiation is unworkable so long as the two classes possess, on the average, equal educational and professional attainments—and this is undoubtedly the case.

When it is remembered that the Indian Colleges have produced men like Sir William Garstin, Sir William Wilcocks, Mr. F. R. Bagley, Mr. C. E. V. Goument, Mr. C. S. R. Palmer, Mr. C. G. Palmer, and a long list of Chief Engineers, they cannot be said to give the department men of lesser attainments than the English Colleges have sent it. The following opinions also fully bear out the contention that the two classes as at present recruited possess equal educational and professional attainments:—

(i) Sir John Hewett in a speech at Rurki on the 27th October, 1909, spoke of this Institution and its *alumni* in the following terms: "Your assurance, Major Atkinson that it is the aim of yourself and your colleagues to keep the education given in the Thomason College *abreast of the best technical education available in the Western World is amply vindicated* by the extremely high standard of education to which the students who are trained here attain. I have had the privilege of working in close conjunction with two of the most distinguished *alumni* of the College. I refer to Mr. Goument, now Chief Engineer in the Buildings and Roads Branch of these Provinces and to Mr. Harriot at present Superintending Engineer in the Central Provinces, but destined to reach a still more distinguished position in the Public Works Department. I have no hesitation in saying that these officers are *excelled by none* of their brethren in the department for professional skill, for initiative, or for a correct appreciation of the needs of the country. I have had opportunities of observing the same good qualities developing themselves in some of the younger men educated at this College, and I have no doubt that you and your staff will continue, in the future as in the past, to turn out a constant stream of trustworthy Engineers. Your College has recently been described by the Secretary of State as an Institution with a large and illustrious history behind it and you rightly observe that if it is to maintain its *past pre-eminence*, it must keep abreast of the time and that there must be a continuous advance and constant and expensive improvement."

The deep significance of this utterance, by a particularly eminent Lieutenant-Governor of India, will be forcibly realised when it is remembered that it was uttered when the agitation against the changes of 1908 was at its highest, and after Indian College Engineers had utilized the previous utterance of Lord Macdonnell and had held it out to the Secretary of State as conclusive proof that Indian-trained recruits were not inferior to their English contemporaries. It is irresistibly clear that Sir John Hewett would not have spoken in this very definite manner thereby presenting the *alumni* of the Indian Colleges with another lever upon which to work, had he not been completely convinced that Rurki College did in fact turn out men of marked ability.

(ii) The President of the Institute of Civil Engineers has recently recorded the following opinion in the Visitors Book at Rurki College: "I have visited nearly every College of importance in India, but among all of them Rurki College alone appears to me to attain to the standard of a first grade Engineering College, the organisation and equipment are admirable and the arrangements for imparting practical training in Mechanical and Civil Engineering are *hardly equalled* in any Institution in Great Britain."

Further to the above there are the cases of two or three men who have failed to qualify in the first year at the Rurki and have been sent down as unlikely to pass. These men have gone to England and been accepted by the Secretary of State for appointment to the Imperial Service. Names can be given if required.

It is impossible to enforce a distinction in pay where none exists in attainments and the *alumni* of the Indan Engineering Colleges should be restored to the position they formerly occupied, that is, there should be only one service in the Public Works Department.

81,186. **(IX.) Other points.**—*No analogy with other Provincial Services.*—It is widely felt that the resistance offered to the oft-repeated prayer of the *alumni* of the Indian Engineering Colleges to be restored to the position they formerly occupied, that is, on an equality with recruits from England, is due in a great measure to the apprehension that if this is conceded, other Provincial Services would be entitled to similar treatment. It is submitted in reply that the question of the other Provincial Services is foreign to the point at issue. There is no parallel between the case of Engineers rcruited in India and other Provincial Services. Engineers recruited in India are not situated in the same relation to Engineers recruited from England as members of other Provincial Services are to the Imperial officers of those services; but, on the contrary, except as regards the amount of pay, leave and pension, there is in all other respects no distinction between the two classes of officers in the Public Works Department, whereas in other Provincial Services there is the very greatest difference in attainments, abilities, &c. It is therefore submitted that any argument opposing the restoration of the *alumni* of Indian Engineering Colleges to the position they formerly occupied on ground that this would entitle other Provincial Services to similar treatment is unsound and cannot prevail.

Temporary Engineers.—The position occupied by these officers in the department is undoubtedly most unsatisfactory and requires consideration. These officers are at present recruited in *an* irregular manner, and the conditions under which they serve are not such as to secure efficiency. The past history of the Public Works Department in India clearly indicates that a certain number of extra officers are always required in addition to the ordinary permanent establishment. It is submitted that, except in special cases where experts from England are required, these officers should be recruited from qualified persons who have successfully undergone the prescribed training in any Indian Engineering College, and that no other persons should be engaged until this source of supply is exhausted. It is contended that this arrangement will be greatly beneficial to the State Colleges in India and will tend to attract suitable candidates. As regards salary, *it* is suggested that an incremental scale be introduced for these officers.

Mr. L. F. JACKSON called and examined

81,187. (*Chairman.*) The witness stated he was an Executive Engineer on the Oudh and Rohilkhand Railway, with ten years' service, and represented the Provincial Engineers. As yet he had not performed the duties of Executive Engineer, having been employed as the Personal Assistant of the Chief Engineer. He represented seven Provincial officers on the Oudh and Rohilkhand Railway, and his main contention was that the division into Imperial and Provincial Branches should be abolished and an Imperial Service created with exactly the same conditions of pay, leave, and pension, half recruited in England and half in India. He considered that India at present could furnish 50 per cent. of the staff of a superior service. It was an increase on the present establishment as compared with what was at present being recruited but it only amounted to nine appointments *a* year. He based his opinion on the men who were rejected at Rurki: men who were quite qualified by training and knowledge to become officers in the superior service. At present five appointments *a* year were given to Rurki, fifteen being rejected, and those rejected either joined as temporary Engineers or went to Native States and Municipalities. The witness believed the efficiency of the temporary Engineer was as high as that of the permanent Engineer, except in the case of those who had been recruited in a casual way. He had known of one or two cases of companies taking on men who had been rejected at Rurki.

81,188. With regard to recruitment in England, the witness considered the method of selection was faulty and wished to see unrestricted competition. Three men who had been rejected at Rurki (two for the Provincial service and one for the Subordinate service) had gone to England and had been selected by the Secretary of State for the Imperial service within the last six years. His proposal for 50 per cent. of recruitment in India was based on the efficiency of the service. The reason why Company lines imported so largely from Europe was because the men could not be now obtained in India. Of the 15 rejected at Rurki probably only 6 were fully qualified and some of those were taken on by Company lines. The admission of the 5 who were fully qualified would be sufficient to make up the 50 per cent.

81,189. With regard to pension, the witness suggested that if an officer died during service half his pension should be commuted into a lump sum for the wife, who at present would get nothing. On Company railways the officer contributed a month's pay and the Company added one month's salary a year. If the privilege he had suggested were carried out the officers would be prepared to contribute in the way officers on Company railways contributed, and as a matter of fact officers contributed now.

81,190. With regard to the incremental scale for temporary Engineers, temporary Engineers were absolutely necessary because the demand for Engineers on Railways fluctuated very much. He would have a cadre of temporary Engineers on an incremental scale and a certain number taken on for the purpose of certain work. If they were brought into the permanent establishment it would cause a great deal of trouble and so he would place them on a separate cadre. If they were brought into the Department on the ordinary cadre they would absolutely block promotion and the men now in the Department would have a legitimate cause of complaint. Possibly the block might be relieved by an increase of the higher posts. He believed the men on the separate cadre would be quite content and have no grievance even in years to come. They would be doing the same work as men in the pensionable cadre, but their qualifications were not the same when they were originally appointed. They would be men from the Indian Colleges who did not qualify for Government appointments. He would continue promotion from the Subordinate Service as at present because he believed there were men in that Service who were qualified to enter the Superior Service.

81,191. (*Lord Ronaldshay.*) The witness considered there were no differences in the expenses of European and Indian officers, and that there would be no economy in manning the Service by men recruited in India.

81,192. (*Sir Theodore Morison.*) With regard to the men who went from Rurki and were selected by the Secretary of State, the witness said he did not know whether they came in under Clause 5* which said that Natives of India should be selected to the extent of 10 per cent., but they were all three Anglo-Indians. He had no reason to suppose that because they were selected they were at all equal in qualifications to the other 90 per cent. He was not aware that there was a note by the Selection Committee that the men were below the standard and that none of them would have been selected except for Rule 5; he only knew they came into the Service and were now Imperial Engineers. One of them had been in England for 2½ years. His contention was that Rurki had rejected men who had been accepted by the Secretary of State for the Imperial Service.

81,193. (*Mr. Sly.*) With reference to the system of open competition recommended in the written statement, the witness said he would favour a competitive examination in Engineering subjects for the student who had been through an Engineering College. That was not exactly the system which prevailed in India now, because there was no open competitive examination in India for appointments to Government Service. At Rurki there were periodical examinations and each examination was a competition.

81,194. (*Mr. Macdonald.*) Referring to his statement that it was generally recognised that Indian recruited Engineers broke down in health earlier than men obtained from England, and that that was due to insufficient leave, the witness said he could not prove his statement by statistics but he could prove that more English-recruited men were drawing pensions then Indian-recruited men. It was a fact that one of the reasons for their breaking down was that they did not get enough leave.

81,195. As to whether pension was deferred pay or a reward for services rendered, the witness said it had reference to both.

81,196. (*Mr. Madge.*) With regard to the after-careers of rejected Rurki students, the witness said he could give an instance of one man who was first a Temporary Engineer, then an Imperial Engineer, and had now reached administrative rank; and he knew more who had done very well in other careers.

81,197. The witness said he would abolish Madras, Poona, and other Colleges, and have the recruits trained at one Central Institution, which was not to be merely a testing college, but a training college for the students' whole time. He thought economy would be effected in that way. If better prospects were held out to Indians and Anglo-Indians from Rurki a better class of students would join the college in larger numbers. Additional lectures might improve the curriculum. There were practical works in India at which students could obtain training, as for instance, Sara Bridge. When he was at college he visited the Kalka-Simla Railway and studied the construction work there. Students at Rurki were always sent out for a week or a fortnight at a time to construction works.

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* Mr. Jackson afterwards wrote that he had since discovered that one man came *in* under Clause 5 and the other two took the A. M. Inst. C. E. and competed as Europeans.

81,198. (*Mr. Abdur Rahim.*) With reference to Indians of very good qualifications being rejected in England in favour of English recruits with inferior qualifications, the witness said he knew of the case of one Anglo-Indian who was rejected. He was specially chosen out of all India and sent to England on a State scholarship and qualified at the University of Glasgow, where he did particularly well; he was rejected probably because the 10 per cent. was filled up.

81,199. (*Sir Murray Hammick.*) The witness said he had been in England for six months. With reference to the number of Indians that had passed out from Rurki to the State Railways in the last ten years, the witness said that before his time there were only two and since then there had been about seven.

(The witness withdrew.)

At Calcutta, Thursday, 8th January, 1914.

PRESENT :

THE RIGHT HON. THE LORD ISLINGTON, G.C.M.G., D.S.O. (*Chairman*)

THE EARL OF RONALDSHAY, M.P.
SIR MURRAY HAMMICK, K.C.S.I., C.I.E.
SIR TELEODORE MORISON, K.C.I.E.
SIR VALENTINE CHIROL.

MAHADEV BHASKAR CHAUBAL, ESQ., C.S.I.
ABDUR RAHIM, ESQ.
WALTER CULLEY MADGE, ESQ., O.I.E.
FRANK GEORGE SLY, ESQ., C.S.I.

HERBERT ALBERT LAURENS FISHER, ESQ.

R. R. SCOTT, ESQ. (*Joint Secretary*).

Colonel C. A. R. BROWNE, R.E., Agent, Eastern Bengal State Railway.

Written Statement relating to the Railway Department.

81,200. As Head of the Railway, I am confining my remarks to the general and more important points only. The Railway Board have furnished direct to the Public Services Commission a detailed statement regarding the pay, leave, pension, provident fund, conditions of service? and sources of recruitment, and it is unnecessary to reproduce that information in this note.

81,201. Perhaps, the best indication of the feeling on State Railways is given in the following articles which appeared in the issues of August, the 1st and 8th, 1913, of *the Railway Gazette*, one of the leading railway papers, published both in London and in New York. The front page of each issue draws special attention to the most important contribution, and the issue of August the 1st confers this distinction on the article under the heading "Indian and English Railway Employment Compared." I give the articles in full, as they deserve.

The Indian and English Railway Services compared.

(From an Indian Railway Officer.)

This subject is one that map be interesting to your readers, particularly those of the younger generation of railway officials in the United Kingdom possessed of ambition and ability who are thinking of India as a better country than home for carving out a successful career Whether this is the case or not may be judged by the comparison it is here proposed to make of the conditions of employment in the two countries.

To begin with some of the general features of the administration of Indian railways, it should be noted that the railways for the most part are State owned, the more important ones are either administrated by Government or leased on contract to companies for administrative purposes. The railways worked by Government are the North-Western, the Eastern Bengal and the Oudh and Rohilkhand, which are manned by Government employees under the control of the Government Railway Board, whose office is in India. Amongst the principal company-worked lines are the East Indian, the Great Indian Peninsula, the Bombay: Baroda and Central India, the Madras and Southern Mahratta, the Bengal-Nagpur, the Bengal and North-Western, and the South Indian. These are worked by companies under the control of boards of directors, whose offices are in London.

The employees on Indian railways are divided into the following classes :—(*a*) Officers; (b) upper subordinates ; (*c*) lower subordinates ; and (*d*) inferior staff.

The officers are the officials forming the superior supervising staff and are mainly British, recruited for the most, part from the United Kingdom.

The upper subordinates consist of inspectors in various departments, station masters at the larger stations, office superintendents, superior clerks, &c. A Considerable portion of this class are British and Anglo-Indians, or persons of mixed blood. The lower subordinates and inferior staff are comprised principally of natives of India.

The agent of a railway in India holds a position analogous to that of general manager of a railway in England, except that he has more responsibility. He is the legal representative of his board of directors which is in a distant country, and he is continually called upon to act in matters affecting the relationship of the company towards the Government, the public, or the railway staff. Lastly, but not least, the parallel differs in his relationship with the directors of the railway as he has not the immediate personal consultation with them which is of such great assistance to a general manager in England.

The general traffic manager of a railway in India exercises the combined functions of the two posts of the superintendent of the line and goods manager in England, in addition to, on some railways, controlling the telegraph system. The locomotive and carriage superintendent performs the combined functions of the two posts of locomotive superintendent and carriage and wagon superintendent; the functions of other officials are more or less analogous to those of English railway officials of similar position.

The salaries of agents range from Rs. 3,000 to Rs. 3,500 per mensem (£2,400 to $2,800 per annum) those of general traffic managers from Rs. 1,600 to Rs. 2,500 per mensem (£1,280 to £2,000 per annum). The locomotive and carriage superintendent, chief engineer, and chief auditor are paid more or less on the same scale as the general traffic manager. The chief medical officer and the general store-keeper are paid from Rs. 1,000 to Rs. 1,500 per mensem (£800 to £1,200 per annuin) according to the importance of the railway. District officers draw from Rs. 600 to Rs. 1,000 per mensem (£480 to £800 per annum); junior officers start on salaries from Rs. 250 a month (£200 per annum) or more, according to the department in which they are to serve or the nature of the vacancies to be filled, and the maximum they can rise to is Rs. 1,000 (£800 per annum). ThO number which rise to draw more than this salary is insignificant.

In England the salaries of officers are more or less as follows :—

- General Managers up to $5,000 per annuin.
- Superintendent of the Line, £1,500 to £2,000 per annum.
- Goods Manager. 21,500 to £2,000 per annum.
- Assistant to Superintendent of the Line or Goods Manager up to £1,400 per annum.
- District officers, £450 to 2,800 and higher.

On one railway the last-named officials draw even a higher salary than £2,000 per annum.

Indian Salaries.

It will be observed from the foregoing that the agent of a railway in India receives about one-half the salary or a general manager in England. The general traffic manager in India receives no more pay than a superintendent of the line or a goods manager in England, *in some cases even less*, althongh his duties consist of the functions of both those officers, who draw between them a total salary of from £3,000 to $4,000 per annum. In all other grades the salaries paid in England are as high as, if not higher than, in corresponding grades in India. But the differences are very much greater than are measurable by the pounds sterling which go to make up the salaries. The Indian salaries are very largely discounted from the outset by the incidence of Indian employment. At least one-half of the income of the Indian railway officer disappears in outlay on passage money to and from Europe, in taking the necessary leave for the recruitment of his own health, or that of his family, from the effects of a trying climate, or in connection with the education of his children, or on all three, and on all leave above one month per year he loses at least half of his pap. With the exception of one month's privilege leave, in a year cumulative to the extent of three months only, on which he receives full pay, all leave that he takes is either on half-pay or no pay at all. He has often to keep up two establishments, one in India and another in England, and, if he is married. he has to make remittances to England, at a greatly depreciated rate of exchange, while his children are being educcated. These are features of expenditure peculiar to the Indian official; they form no part of the incidence of life in England. Employed in the home country in an invigorating climate, English officials do not need to sacrifice any part of their pay on long leave or in keeping up establishments in two countries, and they are within easy reach of educational institutions where their children can be educated to the highest standard at comparatively small cost. We are not contrasting those conditions for the purpose of showing that the English railway official is remunerated on too liberal a scale, but in order to accentuate the inadequate scale on which the Indian railway official is paid, and to show how impossible it is for him to save anything substantial out of his salary against retirement without privation that must make life miserable.

The Age Limit.

We shall now proceed to show how badly off he is in respect of provision for retirement compared with the English railway official. In the Indian railway services, with the exception of one railway which on commercial principles has refused to adopt it, the general rule is that officers and other covenanted employees must retire on attaining the age of 55 years. This rule does not apply to the directors of company-worked lines, who are free, subject to periodical reelection, to retain their seats during the terms of their natural lives, which in many cases extend much beyond the Biblical " threescore and ten." These directors are, as a rule, better off on their pensions, fees, and the other emoluments their opportunities have placed in their way than tho executive officers of the railways they preside over; they do not realise what it means to the latter to be shelved with possibly 25 more years of life before them on an inadequate superannuation allowance. The objection is, of course, not to retiring at 55 *per se.* but retiring *without adequate provision.* English railway officials are permitted the option of retiring at 60 ;ears of age, but may continue serving until they are 65, and are well provided for both up to tho retiring age and after.

About 50 per cent. of the officers on State railways are non-pensionable, the remainder, consisting almost entirely of the engineering staff, are pensionable. The non-pensionable staff subscribe to a provident fund 8⅓ per cent. of their salary. From the revenue of the railway is contributed every half-year 1 per cent.. of its net earnings, which is a varying amount according to the prosperity of the railway, but never exceeds, and seldom reaches, 100 per ceut. of the officer's own contribution. There are no pensionable employees on company-worked lines except the few who are Ient by Government to the companies. The officers on company-worked lines subscribe to a provident fund to the same extent .as on State railways. The pension of an officer of the highest grade, after a. service of 30 years, amount?, to a maximum of Rs. 5,000 per annum, which. at the prescribed rate of exchange, 21*d*. per rupee, is under £450 per annum and is on a gradually descending scale according to pay. The amount standing to the credit of an employee in the provident fund varies according to the amount of the contribution by the employee and by the railway. and what this is approximately worth. in given instances, will he shown hereafter.

The provision for retirement on most of the railways in England is a superannuation fund to which the employee contributes less than 3 per cent. of his salary and on retirement obtains an annuity amounting to as much as *two-thirds* of his maximum salary. Here are a few typical cases taken at random from the Indian establishments to show what officers have to look forward to as compared with what they would draw in similar positions as to salary were they serving on an English railway:—A., at 55 years of age. after serving about 24 years, has contributed £1,400 towards the provident fund, and he is due to receive only £2,700, which mill purchase an annuity from Government of less than £120 a year (just sufficient to keep him from starvation). On an English railway his contribution would only have been £450 and his annuity would have amounted to nearly 2,400. B., at 55, after serving over 30 *years*, has contributed as much as £2,250. Re is entitled to receive only about £4,000, which will purchase a.n annuity of less than £200 (another case of retirement in comparative penury!). Serving in England he would have contributed only about £600, and would have drawn an annuity of nearly $500. C.. after serving 25 years, has contributed 23,000. He receives only £5,700, which will pnrchase an annuity of less than £250. On an English railway this officer would have contributed only £970 and received an annuity of as much as £800. It may also be of interest. to mention here that in the colonial service in Ceylon. within a few miles of India, the railway officials receive, on retirement at 55 gears, a pension which amounts to two-thirds of the salary drawn for the previous three years, provided they have put in the qualifying service.

"Merit of Little Consequence."

But the insufficiency of their salaries and retiring allowances compared with those of similar officials on other British-owned railways out of India are not the only respects in which the Indian official suffers. Merit, in India, is of little consequence—the good, bad and indifferent officers reap the same reward. He who does nothing out of the ordinary groove makes just as much headway as another who devotes all his energies to pushing the interests of his employers; indeed, the latter is often, in the colloquialism of the day, "left standing," while the former, or perhaps someone from outside the railway, is given the appointment to which the latter has been looking forward and for which he has worked for years, regardless of the fact that, as the field for promotion on Indian railways is narrow, once a man is superseded he has no hope of recovering the lost ground. The company-worked lines are worse in this respect than the State-worked lines. Even those who have been instrumental in building up the prosperity of a railway are, on retirement from the executive in India under the age limit, as a rule, relegated to obscurity. It would naturally be supposed that advantage would be taken of their qualifications and experience to give them seats on the boards of direction of the railways in London or appointments in the boards' offices in recognition of their past services, but these appointments are, with rare exceptions, filled by those who have no sort of claim to them, whereas on English railways and in the great navigation companies—the P. & O., the British Indian and other lines—their executive officials on retirement, can always look forward to being elected to the boards of direction or found suitable positions in the home offices.

English and Indian Service.

From every point of view, therefore, the Indian railway official is worse off than his English compeer, his salary is much lower and is worth about half of what it appears; he is forced to retire 10 years earlier, no matter how efficient he may be; he may have, during his service, contributed largely to the wealth and prosperity of the country and by his experience and influence have become commercially a valuable asset to the railway, but once he has reached the age limit of 55 years, he is shelved, and his retiring allowance, whether from a pension or provident fund, is so attenuated that he is forced to drop at once several rungs in the social ladder, practically to the same position as he occupied when he started life over 30 years before if he is not, indeed, under the necessity of seeking employment anew to supplement his income. He is worse off than any successful shopkeeper in India, who can count on retiring after 20 years' work upon enough savings to give him a comfortable income for the remainder of his life.

In giving up an appointment on an English railway for one in India, he gives up the substance for the shadow, as, besides all the other drawbacks to serving in India, he cuts himself off from opportunities of appointment to more remunerative posts in other parts of the world where the prospects of rising are better than in India, as railway administrations in the Colonies, South America and elsewhere never come to India for their officers; and he must remember that it involves exile and loss of touch with relations and friends, and, when his time comes to retire, he is as a "stranger in his own country," and is, as often as not, thrown on the necessity of vegetating for the remainder of his days in some hill station in India owing to his having lost touch with home, and to the slenderness of his means after retirement.

Having dealt with the question as it affects the young English railway official, who in the glamour of youth may be led into "burning his boats behind him," we shall now consider it from the point of the Indian railway officer himself. Why should there be all these disparities to his prejudice? Look at the matter how we may, we see no reason or justice in his being treated so differently from the officials of railways elsewhere in British dominions. On the contrary, any difference to be made should, in the circumstances, be in his favour. It may be said that the capital invested in Indian railways is so much less than that invested in English railways that the same high scales of salaries are not justified. But from the point of view of the shareholders or Government, as the case may be, there is no need, and it is inequitable, to fix the scales of salaries in proportion to the amount of *capital* invested; it is more reasonable and more to their own interests to fix them in proportion to the *dividends earned*, as 5 per cent. profit is 5 per cent. profit whether the capital is small or great, or whether it is earned in one country or another.

Cost of Living.

To suppose that India is a cheap country to live in at the present day is a mistake, whatever may have been true in the past; prices within the last 15 or 20 years have doubled, in some parts of the country almost trebled, and the cost of living has increased out of all proportion to any improvement that has taken place in the salaries, taking into consideration the fact that in improving the scales of salaries, the Administrations put an end to the Exchange Compensation Allowance. It cannot be on the grounds of work and responsibility that the difference is made, for the Indian railway official has much more strenuous work and greater responsibility than his English compeer. The railways in India are, for the most part, single tracks and even, if equipped up to date and all other things were equal, single track is, as is well known to all railway experts, much more difficult to work and makes greater demands on the intelligence, the resource, and energy of the executive than double track. But it is notorious that the single tracks of India have for years been short of rolling stock; with few exceptions they are not up to date in equipment, and they have to carry a traffic which has much outgrown their capacity and accommodation. Indian railways are operated by the natives of the country who, whatever their virtues may be, do not possess that aptitude or reliability for railway purposes which enables their officers to feel that when an order is given it will be carried out. The Oriental habits and characteristics of the native operative (even when he understands the drift of an order which as often as not he misunderstands) are such that if he be not too slothful to carry it out honestly, his principal aim will be to find a way of altogether evading it. His superior is, therefore, continually in a state of tension in order to keep work going, and this in a climate which of itself is sufficiently trying. In England the railways are for the most part double track; they are equipped up to date, they are not handicapped with rolling-stock shortage or the other drawbacks ever present in Indian railway working; the subordinate operatives are men trained to their business from childhood, they are as intelligent in their sphere as their superior officers are in theirs and know as much about their own work as their superiors do, probably more. The English official has usually the comfortable feeling that he has merely to give an order for it to be carried out; he has none of the anxiety of watching to see how it will be carried out, or if it will be carried out at all, that keeps the unfortunate Indian official continually on tenterhooks. Indian railway officers, as a body, are as intelligent and as capable as any railway officials in any other parts of the world; they have an all-round training in every branch of railway working possessed by few of the officials on railways in the British Isles, and they have the further qualification that their travels abroad have widened their views.

The comparisons that we have so far made, show that Indian railway officers are subjected to disadvantages which constitute serious grievances, and these have given rise to a covert discontent which has been greatly intensified by the latest decision affecting their personal interests. It appears that it has long been a much debated question as to whether a pension or a provident fund is of more advantage to the employee. Some think one is preferable, some the other, but must it not be admitted that it all depends upon the terms respectively of the fund and pension schemes? Given two appointments, one with a pension to which the employee *does not contribute*, and the other with a provident fund to which the employee *does contribute* and that *the salaries in both appointments are the same* (we expressly emphasise this), it does not require much penetration to understand that the appointment *with the pension* is preferable, because in that appointment the employee, besides having his pension to fall back upon, saves for the benefit of his family, either by investment or insurance, the amount that the employee in the *other* appointment without the pension has to pay to the provident fund. In other words, in the appointment *without the pension,* the employee contributing to the provident fund has nothing to fall back upon but what stands to his credit in that fund, half of which, as we have remarked before, is his own money, or the produce of his own money. Whereas, the employee in the pensionable appointment has his pension *plus what he is able* to save from his salary in consequence of not having to contribute. Anyhow, whatever the rights or wrongs of the question may be, it was recognised some time ago that the retiring allowances of Indian railway employees were not sufficient, and a scheme was started by the Railway Administrations for granting, in addition to the amount standing to the employee's credit in the provident fund, a gratuity for "good service," amounting to half a month's pay for each year of service up to a maximum of 30 years, to employees who served not less than 15 years at the time of their retirement. This movement induced the officers to believe that, at last, the Administrations were bestirring themselves on behalf of their employees as a whole; they began to hope that at least one part of their grievances would be redressed, and they waited patiently and in confidence the result of the deliberations of the Administrations on the question. The scheme hung fire for a long time, and then it looked as though it was going to be dropped. but it got about that a serious agitation was being engineered amongst the subordinate employees of the railways. This had the effect of "speeding up" the Railway Administrations' deliberations, and the scheme was hurriedly passed, but it soon appeared that it was only intended for the subordinate employees, from whom the agitation was expected; the officers were, in the most barefaced manner, excluded from its benefits, and up to now no reasons have been given for this further glaring instance of inequitable treatment. So that now, to the old grievances of the officers, which remain unredressed, is superadded a grievance of even a more galling nature, *viz.*, that of being placed on an inferior footing as regards a retiring gratuity to *their fellow employees on the same railway!*

This decision of the Railway Administration is believed to have been influenced by the Indian Financial Department and by the Secretary of State for India, but whoever is responsible for it, or whatever may be the explanation of the difference in treatment between the officers and the subordinate employers, the impression is that advantage has been taken of the superior discipline and loyalty of the officers in not joining in the agitation which precipitated the decision to pass the gratuity scheme for the subordinate employees. That this impression is well founded is only too obvious from the fact that the Administrations in India give way on all the questions of improved salaries and other benefits urged by the men the moment a strike is mentioned. The attitude the Administrations have taken up in the matter of the officers' gratuity is entirely un-English, and it would not be surprising if they found eventually that they had so drained the loyalty of their officers as to drive them, during certain crises, into something more than sympathetic association with their subordinates. It is, therefore, a matter of urgency, in the interests of railways in India, that this matter be reconsidered, as regards officers as early as possible.

Unfair Treatment and its Effect.

The adverse effect of this unfair manner of treating the officer extends much farther than may appear on the surface. Government and the companies stand to lose largely in consequence of the prevailing discontent; things are done which ought not to be done and things left undone which ought to be done. No one, however, discerning or observant, can keep a daily check on the individual work of each officer. Who, for instance, is to tell whether an officer is using his eyes or his ears in the interests of his railway? He has eyes, but he may see not, and he has ears, but he may hear not; he can get through his day's work with a minimum or a maximum of result. If he chooses the former and draws his pay and allowance, who is there to say him *nay?* for, although not openly avowed, the discontent prevails from the highest to the lowest, except amongst that ubiquitous few who, from one cause or another, can afford to regard the grievances of their associates with indifference.

Indian railway officers, as a body, bear a high reputation for integrity, but they are disheartened, and anyone who has made a study of economics will realise the commercial loss that must arise from discontent amongst employees of any class, even though it is not actively shown, and how much greater must the loss be if discontent exists amongst that class on whose brains, energy and influence dependence must be placed for obtaining the best results from the labour of the other employees, and making the most of the machinery at their disposal. Let us illustrate this by giving an instance from the working of trains. The goods train-mileage of all the railways in India amounted in 1911 to 71,493,000, and the vehicle mileage to 2,044,161,000. Computing the difference between the *good* average results of the work of a body of keen officials and the *low* average results of the work of a body of discontented officials in economical working of trains and stock as amounting to only 5 per cent. (which is probably below the mark), we shall see what this amounts to annually. The percentages work out to 3,574,650 and 103,208,050 respectively. The statistical figure of cost of working a goods train one mile is shown as Rs. 2·46 (3*s.* 3⅓*d.*). The cost of working a loaded goods vehicle one mile is given as 19·21 pies (1⅗*d.*); discounting this by one-half, to make allowance for empty vehicle mileage, we have 9.60 pies (·81*d.*) per goods vehicle per mile. This gives a potential aggregate difference in working results per annum under these heads of Rs. 140 lakhs (£933,333). Again, if we take the *total working expenses* of all railways in India, which in 1911 amounted to Rs. 28,83,92,000 (219,226,133) as being capable of being reduced or increased by the quality of the work of the employees, even to the extent of only 1 per cent., the potential difference amounts to Rs. 28,83,920 (£192,261). So, here we have under only three heads (illustrations could be given under many more heads) over a million sterling annually, which may be saved or lost to the proprietors of the railway systems of the country according to whether the employees work keenly or otherwise. These simple illustrations may bring home to those responsible for the present state of affairs the effect of their policy better than any amount of argument.

The Interests of Employees

It was not intended herein to touch upon the interests of employees below the rank of officers for, as we have shown, they are not on the whole recruited from England, and those who are so recruited are better off on their salaries than officers are on theirs, owing to *the different* conditions of living. They are not under the necessity of hypathecating any considerable part of their incomes to social obligations as are those in the officers' grade by the requirements of the society in which they are unavoidably placed. Still, the fact cannot be ignored that even the subordinate employees are being treated grudgingly as regards the retiring gratuity. The Administrations, overcome with a sense of their surpassing generosity and aghast at its possible financial results, are divising certain corrective measures which are bound to minimise the benefits which would otherwise accrue to the staff. The most conspicuous ruling in this direction is that extensions of service above 55 years amounting to over 2 years will bar men from receiving the gratuity on the plea that they cannot expect to receive a gratuity *as well as an extension of service!* Why they cannot is more than they can comprehend. This is giving with one hand and taking away with the other with a vengeance. If a man is in health and efficient, and renders adequate compensatory service for the salary he receives, it is not an eleemosynary act on the part of the employer to allow the employee to continue working, *nor* does such toleration or generosity on the employer's part constitute any just cause for depriving the employee of a gratuity, which he would have got if he had retired earlier—rather should it give him, on the grounds of longer service, a greater claim to the gratuity. Not long ago this is what a highly-placed member of one of the Indian Presidency Governments said on the subject of extensions of service:—

EXTENSION OF SERVICE.

"Extension of service is not given to . . . public officers who have passed 65 years of age unless they are in every respect efficient, mentally and bodily, for the continued performance of the duties of their office. The Government of India has pointed out that the premature retirement of an efficient officer imposes a needless charge upon the State and that the State should not be deprived of the experience of efficient public servants by the exercise of the power possessed by a local government of compulsorily retiring them at 55 years of age. Government cannot regard any discontent which may possibly exist among junior officers, whose promotion is less rapid than they hoped, as in itself a sufficient reason for discontinuing a policy which is designed for the general good of the State."

Where, then, is the justification for the latest qualification of the condition of the grant of the gratuity? It is perhaps sufficient to say that it is as reasonable as the (?) argument used in the controversy on a provident fund *versus* a pension fund that, when computing the benefits which they provide for their employers, Railway Administrations are bound to chalk up to their own credit as part of the provision *the amount contributed to the provident fund by the employees out of their own pockets!*

The total capital expended on Indian railways amounted in 1911 to Rs. 4,50,06,80,000 (£300,045,333) and the revenue to Rs. 55,27,92,000 (£36,852,800) yielding a profit of Rs. 26,44,00,000 (217,626,6671, or 5·87 per cent. on the capital, and the revenue is increasing year by year by leaps and bounds. There are thus very large interests at stake, and it behoves the Secretary of State, the Government of India, and the several company administrations. who are responsible for safeguarding the vast amount of capital invested in India, to see that the men on whom they have so largely to depend for a remunerative return on this large capital are treated with the consideration to which the circumstances entitle them. It is hoped that, now that the situation has been so fully represented, measures will be taken to put the Indian railway service more on a footing with the other railway services in the British Empire.

One of the matters which is mentioned herein is but lightly touched upon, namely, the leave and leave allowances. These are so hedged in with the red-tape restrictions of nearly half a century ago that they do not confer anything like the advantages which they were intended and are supposed to confer.

81.202. The articles bring out two points very clearly—firstly, the great disparity in the pay and prospects of Railway Officers in England and in India; secondly, the increasing discontent. An important paper of the standing of *the Railway Gazette* would not print articles expressing these opinions without the certainty that the writer was a person whose opinion and statements could be accepted. The writer represents an extreme of opinion; but I myself have heard the opinion freely expressed that if the Officers were to strike, they would be treated in a very different manner to what they are now, and I know that the feeling of discontent among the officers of the Superior Revenue Establishment is widespread and deep. I say without any hesitation that there is great justification for that feeling. On Indian State Railways the whole of the establishment, with the one exception of the Officers serving in the Engineering Department, is included in the expression "Superior Revenue Establishment." When I use that expression I exclude the officers serving in the Engineering Department, but include Engineers serving in the Agency and the Traffic Departments.

The articles show how badly Railway Officers are paid in India, as compared with those in England, especially when it is considered that the pay should really be higher in this country than in a temperate climate. The idea that India is a cheap place to live in is not correct. Most of our Officers are married and, as railway work lies practically entirely in the plains of India, for the greater part of their service they have to maintain an establishment in England in addition to one in India. To these disadvantages have to be added the very heavy expenses of the voyages to and fro, and the fact that during furlough Officers only get half pay, and in the case of the higher paid officers less than half pay, as the latter are hit by the maximum permissible under the Civil Service Regulations. That maximum of £1,000 a year and the furlough allowances fixed in sterling were laid down when the exchange was above two shillings, and when the cost of living in England was not two-thirds of what it is now. It has further to be remembered that Railway Officers are precluded under the spirit of Government orders from investing, and still more in speculating in many most profitable concerns. Speaking now only for the Eastern Bengal State Railway, my position renders it desirable that I should abstain from investing in the shares of tea, jute or coal companies, in many cases in land, and in the shares of subsidiary railway companies or in those of the inland steamer companies. I am in a position to have special information on many of these matters, but it is a good principle that an Officer on a State line should not be liable to any suspicion of being biassed in his management of the railway by pecuniary interests in schemes which his official action can affect. If a Railway Officer is to be debarred from what would in other circumstances be a legitimate source of profit, it should be made up to him in other ways, and most certainly the present rate of salary with the increased expenditure, both in India and in England, does not allow of an Officer making a proper provision for his family or for his own retirement at the end of his service. The letter in the *Railway Gazette* shows that the public are being warned against employment on railways in India, and it will have a disastrous effect on the efficient management of railways if this idea is allowed to gain ground. On railways more than anything else at the present time depends the development of the country. The income from railways, and the prosperity of the country, have been increasing recently in a ratio which was not anticipated ten years ago by the most sanguine enthusiast. Every effort should be made to continue this progress, but the progress cannot be the best possible unless there are really good men on railways. Government possesses a devoted body of Railway Officers. taking a pride in their work and in the splendid results produced, but they feel that they are not being properly treated. They are getting disheartened and in some cases disgusted, and this is bound to act most prejudicially not only on the sources of recruitment but on the efficiency of the existing staff.

It should be accepted as a principle that, if an officer shows zeal and ability, the terms of service should be such that he can live in reasonable comfort during his service, and that when he retires he should be in such a position that retirement does not mean a complete alteration in the style in which he has been accustomed to live. He should not, when he retires, find himself through no fault of his own in such a position that his pecuniary circumstances force him to give up the style of living to which he has been accustomed and which has been forced on him by the conditions of his service in India. He has the *otium*, but the *cum dignitate* is in most cases sadly wanting. As a case now under consideration by the Government of India, I may mention that of Mr. T. A. Hindmarsh who recently retired owing to ill-health from the position of Locomotive Superintendent of the Eastern Bengal State Railway. He had 28 years service, had held for 8 years the highest appointment open to him on State Railways, and during the whole of his service he subscribed under the rules in force to the State Railway Provident' Fund. The bonus granted by Government on this Fund is supposed to be equivalent to pension, but the rules are such that, whereas had he been a Civil Engineer, he would have obtained a pension of £525 per annum, the Government contribution will give him an annuity of £144 a year only.

It is essential that, if there is to be a contented and efficient staff and railway development is to continue to progress as it ought to, (1) the officers must be properly paid during their service, remembering the conditions under which they are serving, and (2) the retiring pension or gratuity must be such that an officer can live in the same style in England that he has been accustomed to doing during his service.

81,203. **(IV.) Conditions of salary, and (VI.) Conditions of pension.**—As regards pay, a small increase only is called for, except in the higher paid appointments, but the pension or pension equivalent should be raised greatly. With the present expense of living in England, it is not right that Government should allow any railway officer of the rank of Head of Department to retire on less than £1,000 a year. This is quite irrespective of the savings that the officer may have been able to make during his service. If a proper pension is given, the salaries in India need not be increased greatly; but if the pension is not increased then a substantial increase should be made in the officers' pay, so that they can lay by something to assist the Government pension.

At present there is a very invidious distinction made on railways between Officers in the Engineering Department and Officers of the Superior Revenue Establishment. This is the result of bygone conditions. Even 30 years ago, when I first joined the service in India, it was considered that an Engineer Officer could work sucessfully in any of the departments into which railway working is divided. The reason was that at that time the only men of education and ability in Public Works were the Engineers the Officers of the other departments being picked up any how—so that when the Engineer was transferred, for his own advantage in order to get on faster, to one of the other departments, he rapidly showed that he was a better man than those recruited haphazard. This state of things, however, has completely altered. India has gradually recognised, what has been known for many years in England and other advanced countries, that the working of the various departments of railways requires just as much ability and knowledge, and in some cases special technical skill, as the Engineering Department itself. The most important department on a railway is not the Engineering but the department that brings in the money —the Traffic. In the case of Engineering, faults in construction or maintenance are apparent to everybody, but the difference between first class traffic management and passable traffic management can be told only by a man who really knows railway working. Traffic working is a speciality, and efficient traffic working means the difference between mediocre success and the greatest possible efficiency, giving financial results compared with which a few additional lakhs a year in the way of salary and pension are absolutely negligible. It is utterly wrong that the Traffic Department should be paid worse than the Engineers and have such very much worse pensions. What I have said about pay and pension for the Traffic Department applies also to the other important departments on railways, namely, Locomotive, Carriage and Wagon, and Stores.

During the last financial year, on the Eastern Bengal State Railway, the Engineering Department had to deal with an expenditure of Rs. 1,51,00,000.

The Locomotive and Carriage and Wagon	1,14,00,000
The Stores Department	1,08,00,000
The Traffic Department	42,00,000

and this latter department had also the earnings of 351 lakhs. These are large sums of money, and it is the truest economy to have a thoroughly competent staff, if these sums are to be dealt with economically and efficiently and if all the revenue possible is to be gathered in. A discontented staff does not and cannot do its best.

As stated above, a large increase in the existing pay is not called for, *provided* the retiring pension for Heads of Departments is fixed at £1,000 per annum and the minimum pension is raised to £400. On this assumption I consider that the salary now fixed for the Executive and Assistant Engineers is fairly liberal, and that, if an exactly similar scale of salary was granted to the other departments mentioned above, the Officers of district and assistant rank will be reasonably treated. It is, however, otherwise in the case of Officers holding administrative rank in all departments. First and foremost it is entirely wrong that the Officer holding the rank of Engineer-in-Chief of the Eastern Bengal State Railway should get Rs. 1,500 a month only. This has hapened more than once since I have been on the line. I also consider that the pay of Deputy in all departments is too low at Rs. 1,500. Deputies in all departments should get Rs. 1,750; and if there are two Deputies, the senior should get Rs. 2,000, the pay of all Heads of Departments being fixed at Rs. 2,500 a month. In Agency, the Deputy Agent should get Rs. 2,000; and if there are two Deputies, the senior should get Rs. 2,500, and the Agent himself should get Rs. 4,000. I would invite a comparison between these pays in India with the pay of similar appointments in England and particularly in America. The responsibilities and the amounts he has to deal with are far greater in the case of an Agent than in the case of the Chief Engineer of a Province, and yet the pay of both is the same, while the position of the latter is higher. We are repeatedly told that railways are business concerns to be run on business principles, and railway men should be paid on those principles and not in comparison with what happens to be the pay of an Indian Civil Servant in the same district. The two things cannot be compared. The position of Agent is practically the highest any Railway Officer can reasonably expect to rise to, whereas a Commissionership is comparatively low down among the appointments held by the Civil Service.

As regards the pension, the first difficulty is that the Engineers are the only pensionable men on railways. They have their own scale of pension rising from a minimum of £350 after 20 years' service to a maximum of £612 per annum. The minimum should be raised to £400 and the maximum to £1,000. The whole of the remainder of the establishment of railways is non-pensionable, and the Provident Fund, which is supposed to give the equivalent of pension, does not and never will under the existing rules. The minimum bonus under the Provident Fund should be increased to a hundred per cent., with another 25 per cent. depending on the dividend earned on Capital. At present the bonus depends on the net earnings, which gives a different result. In many years the highest bonus given is that on the North-Western Railway, and the lowest on the Eastern Bengal State Railway, whereas, during the same periods, the latter was earning the higher dividend on its capital, and the North-Western Railway the lower. Then for the Heads of Departments and Deputies on the Superior Revenue Establishment, I would give them the option when they retire of either taking their bonus in the Provident Fund or else forfeiting their bonus altogether and taking the pension admissible to Chief and Superintending Engineers. I do not propose a higher pension than £1,000 for Agents. With the higher pay they will be recompensed sufficiently.

81,204. **(V.) Conditions of leave.**—The amount of leave given is liberal, and officers should be encouraged to take leave, for work on railways is very heavy and is growing heavier every day. Officers who have to work in the plains of India require leave and rest, particularly when they are a bit older. They do better work in the long run. Establishments are, however, kept so low, and in many cases largely below the sanctioned strength, that is to say, below the scale that the Railway Board have themselves admited as necessary for efficient working, that in many cases Officers have had to be refused leave due to them, because there was no one to carry on their duties. The only remedy for this is for the scale to be kept up to full strength. There is no reason why this should not be done, for railways are steadily increasing, and with them the number of Officers employed, so that there can be no possible fear of establishments ever having to be reduced. The rule that privilege leave cannot accumulate beyond three months is a good one and I am strongly of opinion that all Officers should go on long leave once in three years. The rule regarding combined leave is also good, but all Officers should be permitted to take leave whenever they can be spared, regardless of the time since they last returned to duty. Then to further encourage Officers to take rest, the proposal which has been under consideration for some time past, should be adopted, namely, that instead of an officer taking a years' leave on half pay he can take six months on full pay. To further encourage officers to go on leave, it should be ruled that no officer can accumulate more than three years' furlough, and the rule that officers cannot take their first furlough till they have been eight years in the country should be abolished. I always advise young officers to accumulate their privilege leave and go home on the first opportunity, so that they can keep in touch with their people at home. They then feel the expatriation less, and visits to England at reasonable intervals give them a mental as well as a physical impetus.

81,205. (I.) **Methods of** recruitment.—The next question—and one the importance of which cannot be exaggerated—is the method of recruitment. Taking the Engineers first, we have a certain number from the Royal Engineers, others known as Imperial Engineers recruited by the Secretary of State in England, we also have the Provincial Engineers trained in India, and also Temporary Engineers. I am strongly of opinion that the number of Royal Engineers, employed on railways in India, should be largely increased. It is admitted that they are an exceptionally able and hardworking body of officers, and their present numbers are not sufficient for the purpose for which they are employed, namely, as a reserve in war. At present there is a total of 37 Royal Engineer Officers employed on State Railways. I do not know how many officers were employed on the railways in the South African War, but I was Director of Railways to the Allies in China, and I had 14 military officers in addition to the civil staff and, out of these 14, six only were Royal Engineers. The other eight had to pick up their duties the best way they could during war time.

The Imperial Civil Engineers that we are getting now are a goad body of officers, and I have no suggestion to make in regard to their method of recruitment. On the other hand, the Provincial and Temporary Engineers are not good and are getting worse. This is due to the Civil Engineering Colleges in India being closed for appointments to the Imperial Civil Engineering Establishment. I need only mention the names of Messrs. Willcocks, Bagley, Monk, Goumont and Rai Bahadur Rala Ram, I.S.O.—men who can stand comparison with the best men from England—to show what good men Rurki turned out. Directly, however, Rurki was closed to appointments on the Imperial list, the class of men who used to go there were replaced by men who could only hope to rise to very small salaries. These men are the present Provincial Engineers. If the mischief stopped there, it would be bad enough, but in the old days the men who had just failed to get Imperial appointments had had the same training, and in many cases were nearly as good, so that we had a large body of good men who could be employed as Temporary Engineers. The existing class of Temporary Engineers are the type of the Provincial Engineers; in many cases they are useless, and very few of them are of any promise. Railways are therefore suffering at present from insufficient recruitment from home, that is to say, the permanent sanctioned scale is not filled by men from England, and at the same time the men available in this country are a good deal worse than they used to be. I cannot urge too strongly that Rurki should be re-opened for appointments to the Imperial service, and that the appointment of the Provincial Engineers to railways should be abolished altogether. Provincial Officers should be appointed only to the ordinary Buildings and Roads Branch of the Public Works Department, where the work is simple and does not require high engineering skill. There is no appointment on a railway which does not require a thoroughly good Engineer, and a bad Assistant Engineer may lose the railway many thousands a year. Besides, it is not right that there should be difference in pay for men doing exactly the same work. If a provincially trained man is fit to be an Assistant or a District Engineer he should get the pay. At present, after a certain number of years of service, the Provincial Engineer attains so-called district rank; he has to be placed in charge of a division, and may be getting Rs. 250 a month less than his Assistant Engineer on the Imperial list. If the Provincial Engineer is fit to be in charge of a district he is fit to get the pay, but my own experience is that he is seldom fit for the appointment. There are now 60 Engineers under my orders, and of these 29 are Provincial or temporary. These contain a large percentage of officers below the requisite standard who not only cause a large loss in the actual cost of works but, what is worse, who delay work, thus crippling the carrying capacity and therefore earning power of the railway.

As regards the Locomotive and Carriage and Wagon Department, the officers are obtained from England and are distinctly good, but here again we are hit by the bad pay in India, for several of these men, after they have been trained on our lines and have shown themselves above the average, are offered appointments with Locomotive firms in England and naturally accept the offer.

The next department is Traffic. The present sources of recruitment are (1) England, (2) India. The selections in England are from the Universities or from men who have had a certain amount of training on English Railways. These men are on the whole distinctly good. In India there are a certain number of appointments reserved for Statutory Indians. The men selected from this source are distinctly indifferent on the average, being merely nominated and having to pass no examination whatever previous to getting in, and they compare very unfavourably with the type of man from home.

Here again Rurki can come to our assistance. It is bad policy in the Indians' own interests to force into the service men who compare unfavourably with the European, and it would therefore be a good thing if the appointments in India to the Traffic Department were reserved for men who had gone through a course of Engineering at Rurki. This would make the Engineering class still more popular and insure what we all desire, namely, that the best men available should get the appointments. All admissions into Rurki should be by nomination, the number of nominations to be at least six for every vacancy which is offered on the Imperial list, whether Engineering or Traffic. With these appointments open to them on railways, with the further appointments in the Provincial Service, and with the yet further certainty of the need for Temporary Engineers, a very good class of men would enter the Engineering College. There would be the further very great advantage that when an Indian did get in, he would be a man of proved merit and not one who would discredit the ability of Indians to administer and organise, and compare unfavourably with the European working alongside him.

Rurki should be a technical college, under the Railway Board, not under the Educational Department, and the instructors should, as far as possible, be Engineers. To begin with, 20 per cent. of the appointments on the Imperial list of the Engineering and Traffic Departments might be reserved to the College, this percentage being subsequently increased or decreased according as that source of supply was found to be satisfactory or the reverse.

One other Department is left, namely, Stores. This has never been recognised as being of the importance it really is. In the past its recruitment has been worse than haphazard, particularly in view of the large amount of technical knowledge required in passing and dealing with the mixed variety of stores required for the Engineering, Locomotive and Carriage and Wagon Departments, and of the great opportunity Officers in the Stores Department have of adding to their salary by dishonest methods. Cases where this has occurred are known, and low pay spells temptation. The class of Officer must be improved, and the past method of appointing men, sometimes because they have been successful Head Clerks, and others because they happen to be the *sons* of other meritorious subordinates, must be abandoned.

It is now being recognised that Stores require technical knowledge. I am not referring to the ordinary routine work of receipt and issue, but to the proper inspection, passing and knowledge of stores. This knowledge the existing class of Store-keeper does not possess, and he will not possess until the system of recruitment is altered. Over 12 years ago I urged the importance of the Stores Department, and said it was the greatest mistake to under-pay the men and to recruit them as they were being recruited. At that time the head of the Stores Department on the State Railways could only rise to Rs. 950 a month. His pay has been recently increased to Rs. 1,500, but even this is not enough. If officers in the Stores Department are to be of proper use, their pay and pensions, which includes Provident Fund which depends on pay, must approximate much more closely to that of other departments. Stores work is exceedingly irksome and monotonous to some people, and Officers have to be paid to do uninviting work.

81,206. *Conclusion.*—Summing up, I consider the pay of all administrative posts should be raised, that the pay of District and Assistant Officers of all departments should be raised to that of the Engineering, that the pensions for Heads of Departments should be £1,000 a pear, and the minimum pension raised to £400, that there should be certain modifications in tho Provident Fund and in the leave rules, that the system in India of recruitment for the Engineering, Traffic and Stores Departments should be radically changed, and that Government should recognise that a body of Officers, who are now contributing by their labours forty millions sterling a year to the revenues of India, should be recognised as a service requiring men of the highest abilities and attainments, as on them depends the commercial advancement and prosperity of tho country.

Colonel C. A. R. BROWNE called and examined.

81,207. (*Chairman*) The witness had occupied his present position for just over five years. He had been employed on railway work since 1859 and in the management branch of the railway service since 1900.

81,208. The answer to the question whether the Cooper's Hill system should be re-introduced in England depended very much on whether or not there was competition to enter Cooper's Hill. Personally he thought the recruits now coming from England were good enough; they were keen, well educated, and did their work, and their knowledge on entering the service indicated that the training they had received in the various engineering schools in England was fully adequate.

81,209. He suggested that the division of the engineering branch into Imperial and Provincial branches should be broken down, and that Imperial officers should be recruited in India on the same pay as that given to engineers who were recruited by the Secretary of State; his view being that men who did the same work should be given the same pay, and also that the engineering work on railways was of a different class from the work in the Building and Roads Branch. The man who was a sufficiently good sub-divisional officer or district engineer for the Building and Róads Branch was not good enough for railway work. There was no railway work which could be called routine. That fact was shown when Sir Rajendra Nath Mukerjee, in saying that the Public Works work at the Presidency towns should be given to contractors, expressly excluded railway work.

81,210. The standard of the officers recruited in India had deterioiated since the closing of Imperial appointments to the Indian colleges. The prospects had diminished and naturally the same class of men did not attend the colleges.

81,211. It might tend to improve the general standard of the service, if distinctions of status were removed, and all officers were placed in one service, but it depended entirely on the class of man it was desired to recruit. There was no room in railways for what was called a Provincial engineer

81.212. He would not be in favour of allowing the grant of a compensation allowance for Europeans serving in India, over and above their ordinary pay, because it would lead to very great trouble. It would bring out in a very clear way the difference in cost of the two services, and it would lead to a demand to decrease the recruitment from England, because an agitation would be aroused in India to show that such recruitment was expensive to India, and that a greater number of natives of India should be employed. Even if the principle of a foreign service allowance were made universal throughout all departments there would still be a feeling of grievance. He did not agree that if all officers were paid alike the expense would be very considerable. He only proposed the recruitment of a certain number of officers in India, and the very best men would be obtained. It was a question of supply and demand. If as good men could be obtained in India they only came in because the pay was good.

81,213. At present 37 per cent. of the superior service was recruited in India. Assuming that this proportion were not decreased, and that all officers were paid the same rate of salary, he agreed it would entail a very considerable expenditure, but in his opinion the increased efficiency would be well worth it.

81,214. He suggested that the proportion of 37 per cent should he reduced. At present, owing to such a large number of Indians being allowed in the service, the Department was getting a great proportion of officers who were not really fitted for the work, with the result that the statutory Indian was getting a reputation that was not quite deserved. If the percentage was decreased, and the test made higher, it would be much better in the interests of the Indian himself. It would be a lesser evil to reduce the number of Indians and to pay those who were admitted the same rate as Europeans, rather than ta allow the present number of Indians in the service, and at the same time to give a foreign allowance to Europeans.

51,216. Out of the 65 engineers on the rolls of his department 29 were provincial or temporary, a large percentage of which were below the requisite standard. The quality of the men who were employed in temporary appointments had gone down very greatly of recent years. One reason of that was the abolition of Rurki for Imperial appointments, and another was the practical impossibility of any temporary engineer, however good he was, getting on to the permanent list of the Government service. Men used to come out from England years ago, but now they did not, because there was absolutely no chance of their being made permanent. The work of that department had been increasing, but there had been no increase in the strength of the permanent officers, with the result that a great many of the so-called temporary men were doing practically permanent work.

81,216. At present none of the provincial engineers had been superseded, but it had been a matter of a good deal of discussion between his Engineer-in-Chief and himself as to whether certain officers should be promoted. In Government service the error always laid on the side of leniency.

81,217 He thought the establishment of one central college for the training of highdr engineering work would tend to efficiency more than anything else. Those who mere to be trained for higher posts should be kept quite separate from those who were being trained for subordinate posts.

81,218. He suggested that a larger proportion of vacancies should be given to Royal Engineers. A Royal Engineer cost very little more than a Civil Engineer now-a-days—about Rs. 100 a month. In the administrative grades the cost was the same as for Civil Engineers. The Civilian Engineer who was now in the service was a thoroughly efficient officer. The main reason for the employment of the Royal Engineer was to maintain an adequate war reserve. Why he suggested an increase in the number of Royal Engineers was that he did not think the number at present employed on railways was anything like sufficient for a war reserve. He also thought that, on the average, Royal Engineers were at least as good as any other branch of the service. From the point of view of efficiencyhe would be very glad of a larger proportion of Royal Engineer officers in the Traffic Department.

81,219. He recommended an engineering training at Rurki for officers recruited to the Traffic Department on the ground that the Rurki training ensured a certain standard of attainments; he wished to obtain officers who had been educated under proper discipline, and he thought Rurki was best adapted for that purpose. Up to two months ago there were no Royal Engineers in the Traffic Department of his railway, but at the present time there were three. The great advantage about having *a* Royal Engineer for traffic work was that he did not take up that particular line of business unless he liked it. He started with a good mental capacity, and took up work which he liked, and the result was he did well.

81.220. There were five Indians in the Traffic Department and he suggested that the proportion should be one-fifth Indians He would put the Indian through a training at the proposed central college. With regard to qualifications, he would ask of an Indian that he should go up for the examination, and reach a certain position on the list. For instance, after the final examination, he would offer the top men a place in the Engineering Department or the Traffic Department, whichever they liked. Entry to the central college should be by nomination and the scholastic qualification should be left to the discretion of the nominating authority. He thought himself that candidates should be of a certain social standing. Officers obtained from England for the Locomotive and Wagon Department were distinctly good, but several of them after being trained in India had accepted employment with locomotive firms in England. He attributed that to the higher pay they were offered by private firms. He admitted that as a general rule Government could not be expected to pay the same high salaries as private firms, and that that being the case, there would always be **a** certain number of the best men, who would be tempted away into private employ This might, however, be rectified to some extent if better pensions were given.

81,221. The present system of recruitment to the Stores Department was unsatisfactory. The Store Officer should be drawn from the same class of men as now filled positions as Engineers and Traffic Inspectors He did not attach so much importance to technical training for store officers, as to their having been through certain courses, and to their possessing a certain mental equipment. If they happened to have locomotive or engineering experience so much the better. He did not think a single Royal Engineer would be induced to join the Stores Department.

81,222. In his opinion it was wrong that an officer holding the rank of Engineer-in-Chief to **a** State Railway should only get Rs. 1,500 a month. He quoted the case of a particular Engineer-in-Chief who during 1912 had had the spending of 120 lakhs, and during 1913 133 lakhs. Rupees 1,500 *a* month for an officer having such responsible work seemed somewhat inadequate; and the salary should be increased up to Rs. 2,500. He was also strongly of the opinion that one of the Chief Engineer appointments should be reserved for the Eastern Bengal State Railway.

81,223. With regard to his suggestions for an increase in other scales of salary, perhaps he had not made clear in his written statement the enormous size and importance of the work which railway engineer officers were doing. For instance, the East Indian Railway, and the North Western Railway were, both of them, bigger than any single railway in England from the point of view of the volume of traffic carried. both passengers and goods, and mileage. There was a very strong feeling in the Traffic Department on railways generally that the importance of the work had not been recognised, and that recognition of the importance of the work would lead to much better conditions of service.

81.224. He suggested that the Traffic Managers should obtain the same salary as officers in the engineering branch, their work being of equal importance. It was invidious that one officer should get Rs. 1,100, and another Rs. 1.250. He thought that even if Traffic Managers were given a salary of Rs. 2,500 they would be underpaid.

81.225. There was a lack of uniformity in the payment made to Agents on the different railways. **He** considered it right that an Agent on the Oudh and Rohilkhand Railway should get the same salary as the Agent employed on the North Western Railway. because if the same rate of salary was not paid it would always mean a constant transfer of officers. For instance, an officer on the Oudh and Rohilkhand Railway getting Rs. 2,500 a month, would ask to be transferred to an appointment at Rs. 3,000 **a** month if such fell vacant, and it would be very difficult to refuse it to him if he was a senior officer, but it was not good for the working of a railway that the senior officer should be transferred, and the saving of Rs. 500 in such a case was most uneconomical.

81,226. With regard to the Provident Fund, he agreed that the four claims put forward by the witnesses from the department were most reasonable, and should be acceded to. He also suggested that heads of departments should have pensions of £1,000 a year if on the pensionable list, and that heads of departments on the non-pensionable list should be allowed the option of either taking their bonus, or taking the pension. He did not think that would be offering too much. **He** thought it was important that when a man retired he should have enough to live on. He did not think his proposal would mean that precarious lives would take a lump sum from the Provident Fund, and good lives would take a pension. The Provident Fund rules even with the suggested improvements would not be better than a pension.

81,227. Dealing further with his proposal for a £1,000 pension for heads of departments. the witness said he looked at the matter from the point of view of the men who were working the railway. He wanted a contented staff of officers who could feel that when they retired their services would. be properly recognised. The additional sum involved was absolutely incomparable to the amount of money which a contented and willing staff could earn. Nor did he think that trouble would arise owing to demands from other departments for the same terms, when it could be shown what the railways were doing for the good of the country.

81,228. *(Lord Ronaldshay.)* Men who were recruited to the Traffic Branch from England might possess one of two different qualifications; either two years' practical training in the Traffic Department of an English or Colonial railway, or a University degree. That system had been found satisfactor?. He did not think it necessary that all men coming from England should have had some experience of traffic work on a railway, although it was always advisable; a trained man was always the better for his training.

81,229. He could not say why it was that men who were recruited in India were subject to Indian Service leave rules until they reached *a* pay of Rs. 800, and afterwards were subject to European Service leave rules.

81,230. *(Sir Theodore Morison.)* He had quoted the articles in the written statement to prove the necessity of an increase of pay in the higher appointments. He thought the lower appointments were sufficiently well paid if pensions were increased. Men in lower appointments in England were much worse paid than men in lower appointments in India, but the prizes in India. for *a* very first class man were much fewer in number than they were for a first class man in England.

81,231. In 1902 Mr. Robertson, who was sent out as a Commissioner to reorganise the railways, showed in his return that for the third class traffic in England; in Indian currency, the average charge was 9.84 pie, and in India 2.131; that was to say, the charge in England was four times as great as the charge in India. The same thing applied approximately to goods. For instance, for merchandise the figures were 23.76 against 6.72, and the mineral rate in England was nearly three times that in India. If it was conceded that the revenue of railways in India roughly represented the work done, as it did, and making allowance for the difference in charges in the two countries, the railway revenue in India was as big as that of England, and the work done by the East Indian and North Western Railways was bigger than the work done by an? railway in England. Therefore, if qualified railway men were to be induced to come out to this country, they would have to be properly paid, and they should be given opportunities of rising to prize appointments.

81.232. He thought the men who came out to India on short terms of employment, and who did not continue in Government employment, were not likely to obtain appointments elsewhere, beranse they could not be very good, or Government would not have let them go. He did not think an engineer would be any the worse for coming out to this country. He could not say whether he would gain in standing in the profession by having been in India.

81,233. (*Mr. Sly.*) He thought the suggestion which had been put before the Commission, that. all engineers selected for railway service on appointment in England should serve one year's training on English railways before being brought. out, mas a very good one. He thought it was possible for such a scheme to be carried out, its he had always found English railways very milling to help in that respect. The suggestion that the best method of improving the Stores Department of tho railway would be to abolish it altogether, and amalgamate it with the engineering branch on the same terms, was an impracticable one, because the majority of the stores were required for the locomotive and carriage and wagon departments. He could not say what the system was on the English railways with regard to stores, or what class of men they employed on the work, but he knew that it was entirely different. The firms were all near at hand. and the stores could be obtained from them direct, whereas in India a separate reserve had to be kept. There was not tho same necessity for a stores department in England as there was in India.

82,234. He did not think the fact that the bulk of the recruits in Rurki mere employed in the civil engineering branch, and not in the railway branch of the Public Works Department, would make it impracticable to carry out his proposal for placing Rurki College under the Railway Board. He thought if a man was a good railway engineer he would be a good engineer in any branch. It depended on whether the Public Works Department was prepared to guarantee such men Imperial appointments. He mentioned the Railway Board, because his proposal mas that some of tho appointments should be guaranteed, and he thought the department in charge of the college should be the department which guaranteed the appointments. If tho Public Works Department were willing to have some guaranteed appoinments made, he thought there should be a joint control. His point really was that he did not want to place the college under the Educational Department..

81,235. With regard to pensions, he included under the term "heads of departments," the Engineer-in-Chief, the Traffic Manager, and the Locomotive Nanager and his proposal applied to all the three State Railways.

81,236. He did not think it was necessary to introduce a system of study leave for officers employed on railways, but if a good officer desired to look round in England during his furlough, ha should be allowed to do so, and some allowance should he made to him. He did not, however, approve of a regular system of study leave, as ho thought it was of mnch more importance that the officer should rest.

81,237. (*Mr. Fisher.*) He suggested Rurki as the central college, because it was an established institution, and people were accustomed to talk of Rurki. He did not think there would be advantages in having the central establishment in on indnstrial centre; he thought there might he disadvantages.

81,238. The rates of pay on private' companies' lines were fixed by Government. He meant that the Government would not agree to anything greater than the amounts allowed on Government railways. It was true the companies suggested certain rates to the Government, but very often they were refused. He handed in the following statement showing the pay given by the various railways under the various departments :—

	State and Companies-worked Railways.	Agent.	Engineer-in-Chief.	Locomotive Superintendent.	Carriage and Wagon Superintendent.	Traffic Manager.	Chief Storekeeper.
		Rs.	Rs.	Rs.	Rs.	Rs.	Rs.
1	Assam-Bengal ...	2,500	1.300	1,550	—	1.550	900
2	Bengal and North-Western.	2,750	1800	1,500	—	1,800	850
3	Bengal Nagpur ...	3,000	2.000	2,000	—	2,000	1,400
4	Bombay, Baroda and Central India	3,500	2,000	1,800	1,700	2.500	1,400
5	Burma	3,000	1,800	1,800 +20 p.a.	—	1,800 +200 p.a.	1,050
6	Eastern Bengal State.	3,000	2,000 or 2,500	2,000	—	2,000	1.400
7	East Indian ...	3,500	2,300	2,500	1,800	2,500	1,500 +250 p. a.
8	Great Indian Peninsula.	3,500	2,500	2,500	1,800	2,500	1,400
9	Madras and Southern Mahratta.	3,000 +500 p. a.	2,250	2,100	—	2,300	1,250 +150 p. a.
10	North Western ...	3,000	2,000 or 2 500	2,000	1,500	2,000	1,500
11	Oudh and Rohilkhand.	2,500	2,000 or 2,500	2,000	1,100	2,000	1,950
12	South Indian ...	3,000	2,000	2,000	—	2,000	1,200

81,239 There should unquestionably be some increase in the cadre of the railway establishment. Taking the engineering side for the past three years they had been 6 to 8 below their strength of 40. The work suffered and the men suffered. He thought, considering the work on railways increasing every clay, and must continuo to do so, that it would be necessary to fill those appointments at once by more men from England. The Traffic Department also had been short-handed for a considerable time past.

81.240. His recommendation to put Indians who were to go into the Traffic Department through an engineering college would also apply to Indians who were to be taken into the Stores Department.

81.241. (*Mr. Madge.*) Men came out to India, notwithstanding the fact that higher positions were open to them in the Argentine and elsewhere because of the certainty and prestige of Government service. It was only recently that the railways had increased as they had done, and tho Revenue Departments were beginning to feel that they were not being fairly treated.

61.242. Some of the rejected 'Temporary Engineers were quite as good as those who were accepted and retained. He was referring to a particular incident in that connection. About nino years ago, certain men were sent out under a five years' rovennnt. At the end of that period they asked to be continued as permanent officers. In the interval the method of appointment had been altered, nnd officers were appointed permanently. Some of those five years' covenanted men asked to be retained, but although they were strongly recommended they were not admitted to tho permanent strength

81,243. Administrative charges for railways as a whole averaged between 45 and 50 per cent. of the profits. Taking last year, the gross earnings were 61·61 crores and the total working expenses amounted to 48.92 per cent. of that.

81,244. With regard to pensions, he thought every railway officer would be pleased to pay a 4 per cent. contribution as the Indian Civil Service officers did in order to obtain higher pensions.

81,245. (*Mr. Abdur Rahim.*) Out of a total of 46 officers on the open line cadre. 24 had been appointed in 'England and 22 in India. Taking the survey and construction department, 5 had been appointed in England, and 10 appointed in India. He would reduce the number appointed in India, and supply a better article, because he thought it was in the interests of the Indian himself that it should be so. At present the proportion of local appointments was 50 per cent., and he was very sorry it was, because it meant that the work was not properly done. He knew that the proposal he made as to recruitment was a substantially different proposal from what had been placed before the Commission by other witnesses, but it had to be remembered that in the particular case under discussion he was quoting actual figures, and not rules and regulations. He could not obtain temporary engineers from England, and therefore had to employ Indians. He was flooded with local men, some of whom, if he could possibly get anybody else, he would dismiss at once as unfit for their work. Personally he did not care where a man came from. He wanted a man who would do the work properly. The present class of man which was being recruited was not the class he required. and he thought every engineer on every railway would tell the Commission the same thing. The remedy was to obtain better men, and he therefore wanted it stiffer standard set up.

81,246. (*Sir Valentine Chirol.*) He only wanted to reduce the number of Indians at present because Indians of the right stamp could not be obtained. As soon as the conditions he would like to see introduced were well established, and Rurki produced men of the same type as it formerly did, he would be perfectly willing to increase largely the number of Indians in the service.

81,247. It was part of the contract between Government and the private companies that the pay of the company-worked lines should be fixed by Government and Government knew perfectly well that if they increased the pay of the company railways, they would have to increase the pay of their own men.

81,248. The Provident Fund on the State-owned and company-worked systems was practically the same. The companies were anxious to improve the Provident Fund rules, but Government would not accede to their request.

81,249. The Railway Board was supposed to represent the interests of the railway services at headquarters. He thought there should he a very much stronger Board with more than one interest represented on it. For instance, he would like to see the Revenue services represented on the Board.

81,250. (*Sir Murray Hammick.*) Assuming the Commission recommended a large increase of pay for the heads of the Railway Departments, he did not think the Irrigation Department would have a strong claim for asking for the same increase, because the revenue earned by the Irrigation Department was nothing like that earned by the Railway Department. At the same time he thought the engineers in the Irrigation Department should get the same terms. He had not suggested any increase in the Engineering Department, but only an increase in the salary of the heads of the department. It was a fact that the larger pay which junior officers received in the Engineering Department in India, compared to what they got in England in private companies, did make the recruitment for Indian services much easier. But that was simply because a man before he came out to India did not realise what the expenses of living were, and after all, one's riches depended upon the surplus of revenue over expenditure. It was true to say that young men in India at the present time looking for appointments did calculate a great deal more as to future prospects than they did 40 years ago. Fewer people attached the importance to Government service which they used to, and there was much freer intercourse between this country and England, and people going home expressed opinions pretty freely. He thought unless some substantial improvement was made in pensions, or in the Provident Fund regulations of the railway service, and in the pay of the heads of the Railway Departments, recruitment for the railway in the next few years was likely to suffer distinctly. It was very important in the interests of the country, and of the development of the country, that the railways of India should obtain the best possible officers.

81,251. (*Mr. Chaubal.*) With regard to the case of the temporary engineers which he had just mentioned, he did not know what happened to such men when they returned to England. He knew that one man had found great difficulty in getting another appointment.

81,252. (*Chairman.*) The reason why the State regulated and controlled the salaries of company-worked lines was because the State practically owned all the railways in India.

(The witness withdrew.)

81,253. *Colonel Browne afterwards submitted the following explanatory note :—*

There is one point on which my evidence may have given an incorrect impression which I should be glad to remedy.

I am in favour of greater employment of Royal Engineers on railways, not only as a war reserve, but also because they are on the average better than any other class of officers on railways. I base my opinion on my own and other people's personal experience of them and on the fact that they are naturally better, owing to the examination that they have passed and the training they receive. To get into Woolwich they had to pass at the age of 18 a similar examination to that of Cooper's Hill, for which the limit of age was 20. Cooper's Hill contained quite an appreciable percentage of men who failed to get into Woolwich, and these men had failed to get not only Royal Engineers but Royal Artillery. The Royal Engineers are the top third of those passing out of Woolwich and go for two years to Chatham, where they get further training in technical subjects, and acquire the sense of responsibility and self-reliance which comes from having to command men considerably older than themselves. There is yet a further selection before an Engineer gets out on railways. No Royal Engineer officer applies for railways unless he feels that that work will suit him, and there are many more applications for railways than appointments made: whereas men joined Cooper's Hill, much as they did Woolwich, because it was a recognised service and not necessarily because they felt any special aptitude for engineering work. The Royal Engineer officer on railways is a man who has, after experience of other work, decided to devote himself to railways. These causes must result in the average Royal Engineer officer being better than the Engineer recruited from other sources.

I advocate a greater employment of Royal Engineer officers in the Engineering Department and considerably greater employment in the Traffic Department: as that branch is more in need of strengthening. These are the only two branches in which Royal Engineers would accept appointments. They have been offered appointments in the Locomotive Department, but have refused them.

R. K. Biernacki, Esq., Locomotive Superintendent, North Western Railway.

Written Statement relating to the Railway Department, being a Memorandum on the conditions of Service, Methods of Recruitment, &c. of the Superior Officers of the Locomotive Carriage and Wagon Departments, Indian State Railways.

81,254. (I.) Methods of recruitment.—Provision is made for recruitment from three sources—(*a*) Men trained in Europe, and appointed by the Secretary of State. (*b*) Men appointed in India by the Railway Board. (*c*) By promotion of deserving Subordinates.

For recruitment to class (a) Advertisements are inserted in the Engineering papers inviting applications for posts of Assistant Locomotive Superintendents. Candidates must have had at least three years' training in Locomotive Workshops in Europe, have had Running Shed experience. and must give proof of an adequate Technical Education. The best of the applicants are selected by the Consulting Engineers to Government, Messrs. Rendel, Palmer & Tritton, are put through a *vivâ voce* Practical and Theoretical

Examination, and the final selection is then made. Attention is given to character and general education, as well as to Technical Education, and strict medical examination is insisted upon.

For recruitment to class (*b*) there are no special rules. The men are required to have the same qualifications as those appointed at Home.

For recruitment to class *(c)* there are also no general rules. When men are found suitable they are promoted to fill vacancies.

As regards the suitability of these methods of recruitment: —

To class *(u)*. It is quite impossible to lay down any rigid standard *of* training. There are so few openings on Indian State Railways for Locomotive Engineers that no group of men could be induced to train specially to fill them. Recruitment in the open market, then, is the only alternative, and the present system has proved satisfactory.

To class (b). There have not been many appointments made in this way, but when men have been appointed to 'other than the lowest grade, heartburning has been caused among men already in the service who are thus superseded.

To class (c). There appears no reason why Subordinates, if suitable, should not rise to the superior grades. Subordinates, however, are generally specialists in a particular branch of Railway work, and have not the general technical education necessary to fill posts of Locomotive Officers satisfactorily.

81,255. **(II.)** System of training and probation.—*(a) Training.*—This is dealt with to some extent under I. Though, however, the minimum training is laid down at three years, it is only in exceptional cases that this is arcepted as sufficient.

The training is divided into two parts—

(1) Practical, (2) Theoretical.

Practical *training.*—A young man of 17 to 20 years of age, after **a** good general education, enters the works of a Locomotive Builder, or the Locomotive Shops of a Railway Company in Europe. He there spends some five years, and goes through the various departments, such as patternmaking, fitting, machine, and erecting shops, drawing office, &c. He thereafter goes to the Running Sheds of **a** Railway Company and serves for about eighteen months. The average training is well over six gears, as against three laid down, and this cannot well be shortened. The men arrive in India at from **23** to 26 years of age. Most men pay a premium for their practical training, varying from £50 to $3150 **a** year, though some with interest escape this. Without either premium ***or*** interest it is impossible to get the general training required.

No alteration appears necessary in the present system of practical training. As **it** stands it is very full, a wide field of selection is open, and men not too closely allied in type or training are obtainable.

Theoretical *training.*—No definite standard is laid down, but men are expected to have theoretical qualifications approximating to those required to pass the A.M.I.C.E. examination. Some firms allow their pupils or apprentices to attend Universities or Technical Colleges during three winter sessions of six months each. Some Firms and Railway Companies, notably the Midland, insist on their pupils attending Universities or Technical Schools, and hold examinations to test their progress. In some cases, apprentices obtain their technical education by attending evening classes at Technical Colleges. Theoretical work must be done during the workshop period, for in the Running Department the working hours are so irregular as to preclude any organised system of study.

It would be advantageous to make the passing of the **A.M.I.C.E.** examination, or its equivalent, compulsory.

(b) *Probation.*—Officers appointed by the Secretary of State are not on probation. They come out on a three years' agreement, extended indefinitely by mutual consent at the end of that period.

Officers appointed in India, either by direct recruitment or by promotion from the Subordinate Ranks, are usually on probation for a year.

81,256. **(III.)** Conditions of service.—These are given in Addendum C, **a** copy of a recent agreement made between the Secretary of State and a Locomotive Officer. This agreement is supplemented by the rules laid down in the Public Works Department Code, the State Railways Open Line Code, and the Civil Service Regulations. Generally, the conditions of service are considered satisfactory. In recent agreements, however, Officers have been paid only after reporting for duty in India.. Formerly they were paid from the date of signing their agreements, and **as** most Officers leave paid situations to take up Indian appointments, the present arrangement is hardly fair.

81,257. (IV.) Conditions of salary.—It is felt that the revised scale of salaries for Officers of the Superior Revenue Establishment of State Railways (Locomotive and Traffic Departments) introduced from April 1911 affords raasonable remuneration to Assistants and District Officers, except as regards the maximum rate for District Officers. The present distinction made between District Officers of the Engineering and Revenue Departments in fixing the maximum for the former at Rs. 1,250 per mensem, and for the latter at Rs. 1,100 is an invidious and undesirable one and naturally causes resentment and discontent. The duties of District Officers of the Revenue Department are certainly not less onerous or responsible than those of District Engineer Officers, and it is desirable that the maximum should be the same for all. A new grade of Rs. 1,250 should be added to the revised scale for District Officers of the Superior Revenue Establishment.

81,258. **(V.)** Conditions **of leave.**—Officers of the Superior Revenue. Establishment, State Railways, come under the Civil Service Regulations as regards leave. Officers appointed in England come under the European Service Leave Rules, and those appointed in India under the Indian Leave Rules until they reach the Rs. 800 grade.

Briefly, leave' is divided into—(a) Privilege, equal to $\frac{1}{11}$th of active service, on full pay; (b) Furlough, equal to $\frac{1}{4}$th of active service, permissible after **the** first eight years, on half the average pay of the **pre**vious three years, payable in England at 1*s.* *6d.* in the rupee; (*c*) Sick leave; and *(d)* Leave on Urgent Private Affairs. Under Indian Leave Rules, furlough of 1 year after 10 is granted :—

(i) As most Officers of the Superior Revenue Establishment either come out on the European Leave Rules, or come under them early in their service, it is not proposed to deal with the Indian Rules.

(ii) Generally Officers are satisfied with the rules as. they stand, but the opinion is that more leave is necessary before the completion of 8 years' service. Many Officers break down in health in India before that time, and privilege leave, cumulative to three months, taken out of India, is insufficient to prevent this. It is felt that six months combined leave after the first four years' service should be permissible. The furlough portion of the combined leave could then be deducted from that now due after eight years' service.

(iii) An officer of less than three years' continuous service, compelled to take furlough *on medical* certificate, should receive the same allowance as those who have over three years' service, as under present conditions he does not get sufficient to enable him to live.

(iv) Some simplification of the leave rules seems called for, and certain of the existing restrictions might advantageously be removed without extra cost to Government; for instance, leave earned might be permissible when a man can be spared.

(v) It is felt, that while leave should not be claimed as **a** right there should be a reasonable chance of getting it when due, and that privilege leave refused should not be forfeited, but should accumulate beyond three months.

(vi) The strength of the establishment should be such as to permit of leave being granted in accordance with the rules. On the Eastern Bengal State Railway the last six Locomotive Officers who took leave went on Medical grounds. Of these one died, one retired, one had two extensions on medical certificate and one had one. Most of these Officers went Home after nervous breakdown, brought on by over**work,** due to shortage of Officers.

(vii) Furlough pay is equal to half the average salary of the previous three years. This is felt to be inadequate. In the case of *a* married man, who has.

children at Home, it is a positive deterent to his taking leave. He has a Life Insurance or a Family pension to pay for, subscription to Provident Fund, children's education, and a heavy sum for steamer passages to meet. He has possibly gone home *to* recruit his health, he may require special medical treatment, and he should in these circumstances have sufficient to live on in reasonable comfort. If we take an Officer who has been one year on Rs. 1,000; half his average pay for the previous three years will be Rs. 466, his Provident Institution subscription is Hs. 83, and he has probably to pay from Rs. 60 to Rs. 100 per mensem for Life Insurance. Allowing for payment at Is. 6*d*. in the rupee, the amount actually available for the Officer will be from Rs. 340 to Rs. 390 per menscin. Rather than take leave on these conditions, he frequently works on, and breaks down in health. Furlongh allowance should be at least ¾ths of his previous rhree years average salary.

81,269. (VI.) **Conditions of** pension.—Officers **of** the Superior Revenue Establishment were pensionable prior to 1st September 1581 when the State Railway Provident Institution was introduced *in lieu* of pensions. Although expressly devised to take the place of pensions, the Provident Institution has failed to do so adequately. Recognising this, Government sanctioned, from September 1911, a gratuity, of half a month's pay for each year's service up to 30 years, to Subordinate Members of the State Railway Revenue Establishments with 15 years' service and over, in addition to the Provident Institution bonus; but for reasons unexplained, this gratuity has been withheld from Gazetted Officers. The result is that Gazetted Officers of the Superior Revenue Establishment, State Railways, are now, comparatively, in a much worse position than their subordinates in respect to their provision for retirement, although subscribing to tho Provident Institution on the same basis as the Subordinates, while their position, as compared with pensionable State Railway Officers, is still more deplorable. Annexures A and B shows the actual facts.

(1) The Gazetted Officers of the Revenue Establishment, State Railways, are obviously equally entitled to the gratuity with Subordinates, and common equity demands that they should receive it. Now that the gratuity has bccn granted even to daily paid labourers who do not subscribe to the Proviclent Institution, it is impossible to justify the exclusion of Gazetted Officers. The gratuity should therefore he granted to Gazetted Officers under the same conditions as to Subordinates.

(2) The rate of interest paid in the Provident Institution funds is only 3¾ per cent., whereas the rate of interest paid on deposits in the General Provident Fund, maintained for pensionahle Government servants, is **4** per cent. Obviously the rates of interest paid in the two cases shonld be the same. Since State Railways now earn more than **4** per cent on the capital invested in them, there is no reason why **4** per rent. shonld not be paid on the State Railway Provident Institution funds.

(3) The fluctuation of the half-yearly bonus with the ratio of working expenses to gross earnings is unfair to the Revenue staff, as such fluctuations are largely due to causes outside their control. Also, while subscribers to the Provident Institution suffer in their pension equivalents when the nett earnings of the Railway fall, the pensions of Gazetted Officers of the Management, Engineering and Audit Departments are unaffected, although these officers have a predominating hand in the rontrol of expenditure. In certain cases (*e.g.*, the offices of the Government Inspectors of Railways, Government Examiners of Railway Accounts, and the Technical and Drawing Sections of the Railway Board), the staff already receive a bonus of 100 per cent. irrespective of the earnings of State Railways. 100 per cent. should be fixed as the bonus for all State Railways.

(4) In order that the Provident Institution may give benefits equal to a pension, it is necessary that subscribers after 10 years' service should be permitted to contribute at the rate of ⅛th of their salaries and receive the bonus thereon.

81,260. **(VII.) Such limitations as may exist in the employment of non-Europeans and the working of the existing system of service into Imperial and Provincial.**—The Locomotive service is not divided into Imperial and Provincial.

As regards the employment of non-Europeans—this ma?; be approached from two points of view:—(1) Whether it is worth their while training for the serrice; (2) Whether they are suitable for the service.

As regards (1)—It is first assumed that non-European is practically synonymous with Indian for the purposes of this memorandum. The openings on Indian State Railways are few and preclude the possibility of training men specially to fill them. For Indians there is no possibility of employment as Locomotive Officers in other countries. Thus an Indian mould only have India to train for, there are very few openings for him there, and if he entered the open market his chances of employment are small indeed, for he has to compete with hundreds of men who are capable of taking up and eligible for appointments all over the world. Unless, therefore, **a** proportion of the superior appointments in the Locomotive Service were specially reserved for Indians, it would not be worth their while training for them, and to make such a reservation mould lead to a restriction in selection which conld only be disastrous.

As regards (2)—A proper training can only he obtained in Europe. Only those who have undergone the training know how arduous it is, and few educated Indians mould stand it. In fact many Home bred youths find themselves unable to complete the course. When appointed the Indian mould have to deal with a highly trained and paid European staff in Workshops, as well as with European Drivers and Firemen, and men of both these classes are proverbially hard to deal with.

81,261. **(IX.) Any other points within the terms of reference to the Royal Commission not covered by the preceding heads.**—Practically all the disabilities under which Officers of the Superior Revenue Establishments labour are touched on in the foregoing notes. There is one more point however:—

The question of *Medical* attendance.—In India the incidence of sickness is more frequent than at Home, yet the fees of Indian Medical Officers are higher than those of first class Family Physicians at Home. On most Railways Officers are attended by Civil Surgepns. On the Eastern Bongal State Railway there is a special Medical staff. These Medical Officers, whether of the Indian Medical Service or of the Railway, are whole-time servants of Government, yet they are allowed to accept outside practice and to charge fees for attendance. Officers are entitled to free medical attendance, not so, however, their families. An officer has the option of paying Rs. *2* per cent. ***of*** his salary for family medical attendance, or of paying by the visit, a fee of Rs. 16. In either case he has to pay considerably more than he would at Home. Where, for climatic reasons, the health of an Officer or his family suffers unduly, free medical attendance seems a necessary accompaniment. In Maternity cases, which cannot be considered sickness, attendance should not be free.

ANNEXURE A.

81,262. The statements below show the relative *theoretical* financial positions of District Traffic and Locomotive Superintendents, Traffic and Locomotive Superintendents, Executive Engineers, Imperial Service and Chief Engineers, respectively, on retirement, at the age of 55. In each case the service has been taken as ***32*** years.

A.—District Traffic and Locomotive Superintendents.—The rate of pay arid promotion has been taken at—

1st and 2nd years at	. .	Rs.	400	per mensem.
3rd and 4th ,,	...	,,	450	,,
5th and 6th ,,	...	,,	550	,,
7th and 8th ,,	...	,,	700	,,
9th and 10th ,,	...	,,	*800*	,,
11th and 12th ,,	...	,,	900	,,
13th and 14th ,,	...	,,	1,000	,,
Remaining service at	...	,,	1,100	,,

This represents the case, *under the most favourable conditions, showing* a *more than ordinarily favourable start, and uninterrupted promotion,* **of Superior** Revenue Establishment Officers who do not attain to

Administrative posts, and assuming that 100 per cent. is added to his deposits as bonus.

B.—Traffic and Locomotive Superintendents.—The amount has been arrived at by assuming that a depositor will be a District Officer to the end of the 17th year of his service and will then have 10 years in the Administrative post of Deputy and 5 years as Traffic or Locomotive Superintendent.

C.—Executive Engineers, Imperial Service.—The rate of pay and promotion has been taken as regular and represent the case of Executive Engineers who are not promoted to Administrative posts.

D.—Chief Engineers.—The amount has been arrived at on the assumption that an Officer is an Executive Engineer to the end of the 20th year of his service and will then have 3 years as Superintending Engineer, 3rd grade; 3 years as Superintending Engineer, 2nd grade: and 2 years in each rank of Superintending Engineer, 1st grade, Chief Engineer, 2nd Class, and Chief Engineer, 1st Class.

The rates of pay and promotion have been taken *under the most favourable* conditions and most Superior Revenue Officers *will* not *retire* with the *amounts shown*, though all Executive Engineers and Chief Engineers will receive pensions not less than those shown against them, and their contributions to the General Provident Fund will, owing to the fixed incremental scale of pay, be very close to the favourable conditions on which the calculations are based.

A.—District Traffic and Locomotive Superintendents.—Total Provident Fund calculated on the above scale amounts to Rs. 1,02,103, of which Rs. 50,662 only is Government contribution.

B.—Traffic and Locomotive Superintendents.—Total Provident Fund amounts to Rs. 1,23,484, of which Rs. 61,273 only is Government contribution.

C.—Executive Engineers, Imperial Service.—Pension £437 per annum in addition to General Provident Fund, Rs. 82,395.

D.—Chief Engineers.—Pension £525 per annum in addition to General Provident Fund, Rs. 98,783.

In this table for purposes of illustration, the pension (in cases C. and D.) is compared with the Government contribution to the Railway Provident Fund (cases A. and B.) and the amount in General Provident Fund (cases C. and D.) is the amount subscribed to the Railway Provident Fund (cases A. and B.).

The conversions to annuities or lump sums are worked out in accordance with Post Office Insurance rates.

—	Personal contribution to Railway Provident Fund. cases **A.** and **B.** General Provident Fund. cases C. and **D.**	Pension commuted in cases C. and D. and Government contribution to Railway Provident Fund in cases **A.** and B	Pension in case C. and **D.** and Government contribution in cases **A.** and B. converted in annuity.	Total Capital—Pensions in cases **C.** and D. being commuted.	Total of columns 1 and 3.
	£	£	£	£	£ £
A District Traffic superintendents and District Locomotive Superintendents.	**3,430**	**3,377**	**292**	**0,807**	**3.430** + 292 annuity.
B. Traffic Superintendents and Locomotive Superintendents.	**4,147**	**4.085**	**354**	**8.132**	**4,147** + **354** „
C. Executive Engineers	**593**	**3,047**	**437**	10,140	5,493 + 437 pension.
D. Chief Engineers	**0,585**	6,064	**525**	**12,649**	**6,585** + 525 „

ANNEXURE B.

List of the last six Pensionable Officers who have **retired** *from* State *Railways showing the pensions drawn* **by them** *and their* **service.**

Name.	Date of retirement.	Age on retirement.	Rank on retirement.	Service on retirement.	Monthly salary on retirement.	Pension drawnon retirement.	Commuted value on retirement.	Remarks.
					Rs.	Rs.	Rs.	
Wazir Chand Trikha ...	25th October, 191% .	60 years	Chief Accountant	40 years ...	650	3,703	36,875	
Chxnan Din	26th November, 1912 ...	55 "	District Traffic Superintendent	38 " ...	700	3,362	38,808	
W. J. Carroll	19th October, 1911 ...	55 "	Assistant Traffic Superintendent ...	35 " ...	ā50	2,698	31.160	
A. Upson	29th October, 1912 ...	55 "	Deputy Traffic?Superintendent	34 " ...	1,100	5,000*	57,750	* Pension-paid at 1a. 9*d.* per rupee.
Khair Din	31st January, 1913 ...	55 "	District Traffic superintendent	34 " ...	700	3.433	39,640	
J. C. Lyle	29th March, 1913 ...	51 "	Superintending Engineer	27 , ...	1,750	6,000†	78,200	† Pension paid at 1*s.* 9*d.* per rupee.

List of Non pensionable **Superior** *Revenue Officers who have* **retired** *from State Railways showing the benefits* **dericed** *by them from* **the** *Provident Institution, arid* **their** *service.*

Name.	Date of retirement.	Age on retirement.	Rank on retirement.	Service on retirement.	Monthly eaiary on retirement.	Provident Institution bonus with accumulated interest.	Pension he would have drawn, if Pensionable.	Pension presented by the Provident Institution bonus drawn on retirement
					Rs.	Rs.	Rs.	
J. N. McNair	23rd January, 1908 ...	55 years	Chief Store-keeper	32 years ...	1,100	24,557"	5.000	Rs. 2,126 for 32 years' service.
G. Hales	23rd February, 1908 ...	55 "	District Traffic Superintendent	32 " ...	700	13,058	4,300	" 1.131 " 32 " "
J. L. Kelly	14th March, 1910 ...	56½ "	Works Manager	29¼ " ...	800	12,588	4,800	" 1,151 " 29¼ " "
F. T. Millard	27th April, 1912 ...	55 "	District Locomotive Superintendent ...	29 " ...	950	14,334	5,000	" 3.313 " 29 " "
Mr. W. R. Haughton ...	5th June, 1910	55 "	Special Engineer (corresponding to 2nd Class of Chief Engineers),	32 " ...	2,500	33,900 15,000†	6,000	4,234
Mr. T. A. Hindmarsh ...	16th February, 1913 ...	50 "	Locomotive superintendent	28 " ...	2,000	27,645	6,000	2,121

* Includes a special gratuity of 12 months' pay Rs. 13,200 sanctioned by Government.
† A bonus of Rs. 15,000 equivalent to six months' pay was sanctioned by the Government of India.

ANNEXURE B.—*Concluded.*

List of Non-pensionable Superior Revenue Officers now on State Railways showing their service, the Provident Institution bonus they have got for it and what they will have at 55.

Name.	Rank.	Age.	Service.	Monthly salary.	Provident Institution bonus with accumulated interest.		Pension he would have drawn, if pensionable.	Pension represented by the probable Provident Institution bonus at 55.†
					Actual amount on 31st March, 1913.	Estimated total on attaining the age of 55 years assuring a uniform bonus of cent. per cent. on deposits.*		
				Rs.	Rs.	Rs.	Rs.	
R. K. Hiernacki	Locomotive Superintendent	0 years	9 years	2,000	28.017	44,017	6,000	Rs. 3.377 for 34 years' service.
A. B. Prussia	District Traffic Superintendent.	9½ „	83 „	1,100	18,994	29,544	5,000	„ 2,266 „ 34 „ „
H. C. W. Sage	District Traffic Superintendent.	4 „	8 „	1,100	14,271	15,921	5,000	„ 1,344 „ 23 „ „
S. A. J. Keatinge ...	Chief Store-keeper ...	3 „	5 „	1,100	25,952	30,152	5,000	„ 3,473 „ 27 „ „
J. P. Williams	Deputy Locomotive Superintendent.	9 „	4 „	1,500	17,796	31,796	5,000	„ 3,391 „ 30 „ „
E. S. Strong	District Locomotive Superintendent.	5 „	2 „	1,100	15,528	32,525	5,000	„ 2,158 „ 32 „ „
Mr. H. B. Holmes ...	Traffic Manager	9 „	0 „	2,000	26,280	46,647	6,000	4,039
Mr. J. H. Murray ...	Deputy Traffic Manager and Officiating Traffic Manager.	0½ „	0 „	1,500 & 400 Acting Allowance.	20,434	30,466	5,000	2,637
Mr. C. L. Taylor ...	District Traffic Superintendent and Officiating Deputy Traffic Manager.	0 „	7 „	1,100 & 400 Acting Allowance.	21,490	32,241	5,000	2,791
Mr. G. S. E. Rice ...	District Traffic Superintendent.	0½ „	9 „	1,000	21,442	30,497	5,000	2,640
Mr. C. O. S. Skeaf ...	District Traffic Superintendent.	0½ „	4 „	800	7.101	12,481	2,880	1,081

* Calculated on the present pay of the officers and acting allowance has been excluded.

† The pension figures in this column have been calculated on the total bonus at the age of 55 as shown above.

ANNEXURE C.

ARTICLES OF AGREEMENT made the day of One thousand nine hundred and BETWEEN of the first part, and the SECRETARY OF STATE FOR INDIA IN COUNCIL of the second part.

WHEREAS the Secretary of State for India in Council has engaged the party of the first part to serve His Majesty as a Locomotive Officer on the Railways for the time being belonging to the Government of India or worked by that Government (hereinafter called "State Railways"). NOW THESE PRESENTS WITNESS, and the parties hereto respectively agree as follows:—

1. That the party of the first part will as soon as he may be directed on behalf of the Secretary of State for India in Council proceed to Calcutta for which purpose he will be provided with a first-class passage. No hotel or other expenses incurred in the course of his journey will be allowed. While in India he shall be entitled to travelling allowances according to the rules from time to time in force.

2. That the party of the first part will on arrival at report himself to the Officers of the Government there, and will proceed wherever (whether within or without the territories subject to or administered by the Government of India) he may be directed.

3. The party of the first part will submit himself to the orders of the Government and of the Officers authorities under whom he may be from time to time placed; and will remain in the said service for the space of three years from the date of his reporting his arrival at unless he shall quit the service with the permission of the Government.

4. That the party of the first part will employ himself honestly, efficiently, and diligently under the orders and instructions of the Officers and authorities aforesaid as a Locomotive Officer on the State Railways; in which capacity he will discharge all duties appertaining to that office and also all such duties as are discharged by persons holding similar situations in India, and do all things which may be required of him or which are necessary to be done in his capacity as aforesaid, and will make himself in other respects generally useful as may be required of him by the Government or any Officer thereof who shall be placed over him; and that he will with his own hands employ himself on any work relating to State Railways or works which he shall be competent to do and perform, whether such work shall appertain to the business of a Locomotive Office or not, and that he will whenever required proceed wherever he may be directed, and there perform the duties aforesaid on any State Railway or State Railways; and that he will do his best to instruct in the mysteries of his art the workmen and others who may be placed under him.

5. That the party of the first part will not on any pretence absent himself from his duties without having first obtained the permission of Government or its authorised Officers; and that he will devote his whole time to the duties of the service and will not on his own account or otherwise either directly or indirectly, carry on or be concerned in any trade, traffic or business whatsoever.

6. That the party of the first part will, when required, take upon himself the responsible charge of Government money and stores and will truly and faithfully account for and pay over or deliver to the proper person all money, goods, and stores which shall at any time come to his hands or be under his charge on account of Government.

7. That the party of the first part will conform to all the Rules and Regulations of the Department of the Government service to which he may belong and will obey all such orders and directions as he shall from time to time receive; and that in case he shall be guilty of any insubordination or other misconduct, or of any breach or non-performance of any of the provisions of these presents, it shall be lawful for the Government or their Officers having authority for that purpose to discharge him from the service; and that upon such discharge he will forthwith peaceably leave the service.

8. That unless the party of the first part shall receive notice in writing from some authorised Officer of the Government, six calendar months before the expiration of the said term of three years, that Government no longer requires his services, or unless he shall give notice in writing to the Government six calendar months before the expiration of the said term that he is desirous to put an end to his service under these presents, he will continue therein, upon the terms and conditions herein contained (the Conditions of Clause II. excepted) until the expiration of six calendar months from the time when he shall receive or shall give such a notice in writing.

9. That if the party of the first part shall observe and comply with all the provisions of these presents there shall be paid to him for such a time as he shall be actually in the service and perform his duties a salary at and after the rate prescribed by the rules for the time being in force relating to the Superior Revenue Establishment of State Railways for the grade and class to which he may be from time to time appointed commencing with the salary of the class, grade, viz.:
but that in the event of his temporary absence from duty by reason of sickness, or on leave or otherwise, he shall be paid such salary only as shall be determined by the rules from time to time in force in the department to which he shall for the time being belong. Promotion will be regulated by the rules from time to time in force. But he will not receive promotion in class III. until he is reported competent for the work of an assistant and until he has passed such examination as may be prescribed by the Government in one of the vernacular languages.

10. That the salary from time to time payable to the party of the first part shall be payable monthly in India commencing from the date of his reporting his arrival at Calcutta and ceasing on the day of his quitting the service in India or on the day of his discharge therefrom, or on the way of his death if he shall die whilst therein; but that he will not be entitled to any pension, gratuity or bonus. That during the whole of the service he will be compelled to subscribe to the State Railway Provident Fund and agrees to be bound by the Rules of the Fund for the time being in force. He will not be entitled to exchange Compensation Allowance.

11. That if the party of the first part shall at the expiration of the said term of three years leave the said service with the approbation of Government and having satisfactorily at all times performed his duties, or if he shall, before the expiration of the said term be compelled by ill-health, not brought on by his own neglect or carelessness or misconduct (of which the certificate of the proper Medical Officers of Government shall be conclusive) to quit such service, and shall actually quit the same in India, and up to that time shall have performed his duties to the satisfaction of Government, he shall be provided with a free first-class passage to England, provided that he claims such passage within three months from the determination of his service and leaves India within that time, and otherwise as Government may direct.

12. That if it shall be reported to Government by the Officer under whom he shall be placed that the party of the first part is not competent to perform any one or more of the duties aforesaid undertaken by him, it shall be lawful for Government to dismiss him forthwith from the service.

13. That if the party of the first part shall be guilty of any insubordination or other misconduct or of the breach of any of the provisions herein contained whereby he shall be subject to dismissal, he will pay to Government a sum equal to one year's salary in respect thereof, and that if he shall absent himself from the said service without first obtaining permission as aforesaid, or in case of sickness without forwarding a proper Medical Certificate to the Officer under whom he shall for the time being be placed he shall pay Rupees Ten per diem for every day he shall be so absent, and that if he shall at any time quit the service without the permission of the Government, he will pay Rupees Ten per diem for every day between the day when he shall so quit the service and the day when his said services would have expired; and that all these said several sums shall become due and be paid by the party of the first part as and by way of liquidated damages, and shall upon demand be paid by him to such person as may

be directed by Government to demand the same: Provided nevertheless that it shall be lawful for the Government to deduct the same out of any money which may be payable to the party of the first part an any account whatever.

14. That in any payments made in Great Britain under these presents notwithstanding any rule to the contrary, the rate of exchange between England and India fixed from time to time by the Secretary of State for India in Council in communication with the Lords Commissioners of the Treasury shall be observed.

15. That the proceedings, letters and reports of the Governor-General of India in Council, or of any of the Local Governments, and of all other the Officers and Agents of Government, or any copies thereof or extracts therefrom which shall be sent officially to the Secretary of State for India in Council, or to any Officers or servants in the Indian service of His Majesty in England or elsewhere in any way relating to the sums of money to be paid or allowed to the party of the first part or to his conduct or in any way relating to the premises shall be received as conclusive evidence of any matter therein contained in any action or in any legal proceedings by or between the parties to these presents or in any way relating thereto.

IN WITNESS WHEREOF the party of the first part and

being two members of the Council of India have hereunto set their hands the day and year first abovewritten.

Signed by the above-named
party of the first part in
the presence of

Signed by the above-named
two members of the
Council of India in the
presence of

Mr. R. K. BIERNACKI called and examined.

81,263. (*Chairman.*) Witness held the position of Locomotive Superintendent on the North Western Railway. He was one of three representatives of 204 Revenue men, and was prepared to speak for the Officers in the Revenue establishment generally.

81,264. On the question of recruitment he recommended that Royal Engineer officers posted to the Traffic Department should not be allowed to supersede officers already in the department, whose total service was greater. There was no fixed proportion of traffic officers recruited from the Royal Engineers. There were 12 altogether in the Revenue establishment. Cases had come to his notice in which the recruitment of Royal Engineer officers had prejudicially affected the position of officers already in the department. He could not say how many such cases had occurred. As a matter of fact, Royal Engineer officers when they entered the Traffic Department expected to get on faster than the departmental officers The practical question, so far as it concerned the Traffic Department, was that officers desired to have fair play between themselves and Royal Engineer officers. They did not want any favour to be shewn either way. It would not be fair that a special allowance should be given to a Royal Engineer officer coming into the Revenue establishment. A locomotive man who had done six or seven years' work before he joined the department did not get any 2½ years' service allowance, although he had been under training for 6 or 7 years. It was unfair to give it to one man and not to another. He quite admitted that there must be a certain number of Royal Engineer officers in the department for the purposes of a war reserve. He himself was sent to China for a year during the occupation after the Boxer troubles and saw there the need for training sappers in railway work. If Great Britain were engaged in a serious war abroad, it would make a great difference if she had not properly trained officers to run the railways seized. He agreed it was very important. therefore, that Royal Engineers should be recruited to railways in order to acquire a training. That point was fully realised. Anything that could reasonably be regarded as a disability in the way of Royal Engineer officers getting such training should be removed. It was felt that as the Royal Engineer had to meet certain special expenses, he should receive a special allowance to meet them from the Military Department. but his railway departmental pay and prospects of advancement ought not to be better than those of the departmental men on railways. If the Royal Engineer proved a better man than the ordinary man, then by all means let him get special advancement, but not otherwise.

81.265. District officers in the Revenue departments should receive a maximum salary of Rs. 1,250 the same as District Engineers. In some cases, railway companies outside India paid their locomotive and carriage and wagon staff less than their engineering staff, and in other cases they paid them more. On English railways district officers were actually paid less than district officers in India, but they were not in the same position. In India a district officer was practically a superintendent over his Section, and had complete control. In many cases a district in India was as large as a whole railway elsewhere. Apart from any other side to the question business common sense suggested that district officers working together with equal responsibilities should get the same pay. A railway was a business concern with the narrowest profit margin of any business on earth, and therefore efficiency was essential. Efficiency could not be obtained unless men were reasonably contented, and contentment was impossible if invidious distinctions were made. Then there was another side to the question Men had to be obtained from England to run railways in India, whatever might be said to the contrary, and such men must be paid sufficient to maintain themselves and wife and family. Rupees 1,250 was not *too* much as a maximum for district officers. It was barely sufficient for a man to maintain himself and wife, educate his family in England, and take furlough home when he needed it. The majority of officers never got beyond the district grades.

81.266. There were not many instances of officers in his department leaving to take up work in private firms. They did not get many chances of that, because in the first place' Government service was not a high recommendation amongst business men, and in the second place, the mere fact that a man left his job in India would tell against him. Men got offers from those who knew them personally, generally while on leave.

81.267. He would prefer to go back to the old pension system. He was prepared to give up the whole of his personal contributions towards the Provident Fund for 30 years, in addition to what Government had given him, in order to be made pensionable. His Provident Fund bonus and personal contributions *combined*, for 30 years' service, would only buy him an annuity of Rs. 4,781, or £318, whereas, as a pensionable man, he would get Rs. 6,000 at 1*s.* 9*d.* =Rs.7.875 or £525 a year. But others were not prepared to give up their personal contributions. His bonus alone for 30 years' service would only buy him an annuity of Rs. 2.273 or £151 a year, which seemed to him scandalous. The position was such that married men with families who were nearing the end of their service could get no peace day or night. owing to worry about the future. There were others in a worse position than himself.

81,268. If the officers of the department obtained 100 per cent. bonus, interest at 4 per cent., and a gratuity of half a month's pay for each year's service up to 30 years as was now allowed to subordinates, they would not have much cause for complaint left. Comparatively, they would then be as well off as pensionable men, considering that their life risk was partially covered during their Provident Fund service. If pensions were increased, the contributions and bonus should he increased to correspond.

81,269. The Locomotive Department was the last department on railways in which Indians could be usefully employed as officers. There was an essential difference Between the mentality of Indians and Europeans. The work in the Locomotive and Carriage and Wagon Department was not suited to Indians.

81,270. (*Sir Murray Hammick.*) Private companies gave the same assistance to their Provident Fund as the Government. There was a very decided agitation amongst officers of private companies for improvements in their Provident Funds.

81,271. Free medical attendance for the wives and families of officers was asked for because the incidence of illnesses was greater in India than in temperate climates, and the fees charged by medical men in India were much more than those charged in England. Medical officers on railways charged Rs. 16 a visit, or 2 per cent. of the annual salary, on the contract system.

81,272. (*Mr. Abdur Rahim.*) The reason why Indians of the educated classes were not suitable for work in the Locomotive Department was that their mentality was unpractical in mechanical matters. No amount of training would alter the Indian in that respect, unless his character changed. He did not mean that all Indians were unpractical. Indian artisans were excellent workmen and often good mechanics, but European supervision was required to get the best work out of them. Indians had been tried in administrative posts in other capacities. He had known Indians who had been to Europe and America for mechanical training and they were not, in his opinion, competent. They had not been tried as locomotive officers. He had spoken to members of European engineering firms in India in regard to the employment of educated Indians as mechanical engineers and they had told him they would not have them at any price. There were a number of Sikh mechanics in the Locomotive Department. There were institutions in India for the training of Indians in mechanical engineering. One such institution gave a diploma of licentiate of mechanical engineering. It was absurd. The capacity of mechanical engineers could not be tested on paper. For instance, a gold medallist of the institution referred to came to the Locomotive Department for employment. He was asked what he was best at, and he replied that he was a specialist at lathe work. On being put to a lathe he could not even turn up a bolt properly, a simple thing which a first year apprentice on 4 annas a day could do. The so-called mechanical training given in Indian Technical institutions was ridiculous. Educated Indians did not like mechanical work. They complained that the work was dirty, that the men they had to work with were lower than themselves, and that the pay was not enough. The North Western Railway was trying a scheme at Lahore to raise the standard of Indian mechanics, by taking into the workshops boys who had been educated at an industrial school. The conditions were that they should be artisans' sons, that they should be educated until about 14 years of age, and that they should have learnt the use of tools. They were then taken into the workshops, and served six years' apprenticeship. For three afternoons a week during their practical training they went to school to be further educated. He hoped by this means to make really superior mechanics of them.

81,273. (*Mr. Madge.*) He did not think the difficulty with regard to Royal Engineers would be overcome by getting hold of the Royal Engineer at a period in his career when he was drawing a salary equal to the lowest pay of the Imperial Service, because the lowest grades of the different services were not the same.

81,274. (*Mr. Fisher.*) The figures given in Annexure A to the written statement had not been submitted to a professional actuarial test. But the figures given in Annexure B were actuals, and the annuity values were taken from the Government conversion table. For instance, Mr. W. R. Houghton, a Chief Engineer on Rs. 2,500 a month, retired in June 1910, after 32 years' service with a Provident Fund bonus (including a special gratuity of Rs. 15,000) which would buy him an annuity of £282, while Mr. J. C. Lyle, a Superintending Engineer on Rs. 1,750 a month, who retired in March 1913, after 27 years' service got a pension of £525. Similarly, Mr. A. Upson, a Deputy Traffic Superintendent on Rs. 1,100 a month, who retired in October 1912, after 34 years' service got a pension of £437, while Mr. T. A. Hindmarsh, a Locomotive Superintendent on Rs. 2,000 a month, retired in February 1913, after 28 years' service with a Provident Fund bonus which would buy him an annuity of only £141.

81,275. The officers appointed by the Secretary of State who came to India on a three years' agreement had their services extended indefinitely by mutual consent. Some went back. There had been one or two men who had been either asked directly to go, or who had been given a hint to resign, because they had not fulfilled expectations. In other works, the probation was a practical thing in the Locomotive Department. It was not only a matter of professional efficiency, but of a man's power to handle Indians and to get good work out of them without having trouble. There was quite a sufficient number of men willing to come out on the three years' agreement. But there was difficulty in getting qualified men at the starting pay offered. This had recently been raised to Rs. 400 a month. Rs. 400 a month was fairly reasonable to start with; at any rate, he would not go beyond Rs. 450, which was the starting pay of the Indian Civil Service. Locomotive men now-a-days were not generally qualified until they were from 25 to 27 years of age.

81,276. (*Lord Ronaldshay.*) With regard to his statement that it was unfair that a man should not be paid until he landed in India, the average time which elapsed between the date of the signing of the agreement and the date of sailing was about three weeks. A good deal depended on circumstances. The recommendation was that he should be paid from the date he sailed from England.

(The witness withdrew.)

J. H. Murray, Esq., Deputy Traffic Manager, Eastern Bengal State Railway.

Written Statement relating to the Railway Department, being a Memorandum on the conditions of Service, Methods of Recruitment, &c. of the Superior Officers of the Traffic Department, Indian State Railways.

81,277. **(I.) Method of recruitment.**—It is felt that the admission of Officers of the Royal Engineers to the Traffic Department of the Superior Revenue Establishment of State Railways should be regulated so that it will not adversely affect the position of Officers who have been recruited directly for the Department, and who are in the Department at the time of admission of the Officers of the Royal Engineers. A Royal Engineer Officer admitted into the Traffic Department should not (on admission) be placed in the seniority list of the Department above any Officer already in the Department whose total period of service is greater than that of the Royal Engineer Officer. Hitherto the tendency has been to admit Officers of the Royal Engineers into positions in which they are called upon to supervise work while they are learning that work.

81,278. **(II.) System of training and probation.**—The present rules are considered satisfactory.

81,279. **(III.) Conditions of service.**—(*a*) As men recruited from the United Kingdom or the Colonies have to incur heavy expense when joining their appointments in India, it is considered that they should be allowed to draw salary from date of execution of their Agreements, and not from date of landing in India.

(*b*) There should be a more even distribution of Officers in Class III, grades (i) and (ii), over the three State Railways, so that senior Assistants generally may have more equal opportunities of officiating in Class II.

81,280. **(IV.) Conditions of salary, (V.) Conditions of leave, (VI.) Conditions of pension, (VIII.) Any other points within the terms of reference to the Royal Commission not covered by the preceding heads.**—(Under these four headings Mr. Murray's Written Statement is identical with that of Mr. Biernacki—*vide* paragraphs 81,257–61).

MR. J. H. MURRAY called and examined

81,281. (*Chairman.*) Witness occupied the position of Deputy Traffic Manager in the Eastern Bengal State Railway. He had served 4½ years in that capacity. He came before the Commission to represent 100 officers belonging to the Traffic Department, and the views in the written statement were fairly representative of the whole of his colleagues.

81,282. Royal Engineers should not be placed in the seniority list above any officer already in the department. There had been no recent cases of that kind; he was referring to two specific cases which occurred some 14 or 15 years ago, and from which officers of the department were now suffering. The recent appointments to the department of Royal Engineer officers had been made on fair grounds, and they had taken their proper position in the list. With regard to the two cases he had just mentioned, the Royal Engineer officer had come in as a Senior Assistant Engineer. The witness was not well acquainted with the regulations under which Royal Engineer officers entered the department. At the present time a Royal Engineer officer joined the department very early in his career—during the first two or three years, and joined in the corresponding grade to that which he occupied as Assistant Engineer. In so doing, the witness did not think any grievance would be caused in years to come; the point was that his colleagues desired that the instances which had occurred in the past might not recur in the future. The most practical way to obviate any difficulty in the future was for the Royal Engineer officer to join the department very early in his career. In the witness's opinion a Royal Engineer officer would be quite as useful if he joined the department during that period as if he joined it later on.

81,283. The extent to which he considered recruitment for the Traffic Department should be made in England and in India, respectively, was half and half. For the half recruited in India he would not make any alteration in the present form of training, which he thought was fully adequate. The officer now recruited had to go through a practical course, and to work through the several branches of the department which he would eventually supervise. The witness did not know the original qualifications necessary, as that was settled by the Railway Board.

81,284. He did not agree with the suggestion that if a central college were established, it would be a very useful training for a traffic officer to have a three years' course there. He did not think such a course was necessary. He would sooner have a fair educational test, and selection followed by practical training in the department.

81,285. He recommended that district officers of the Revenue Departments should receive a maximum of Rs. 1,250, like Executive Engineers. He did not know whether officers in the Traffic Department in England and other countries were paid on the same rate as engineers.

81,286. He knew personally of no case in which a man in his department would wish to do otherwise than go back to the pension scheme. Assuming that the claims made in the written statement for the improvement of the Provident Fund were conceded, the Provident Fund would then give an adequate subsistence for an officer, but a pension would be preferable in any event.

81,287. He could not say whether medical attendance for families of officers was guaranteed to any other departments in the Government service, nor did he know of any railways in England where it was allowed.

81,288. (*Lord Ronaldshay.*) With further reference to paragraph 81,279 (*b*), (in the written statement), the witness meant that the relative position of officers on different State railways should be taken into consideration when, in compliance with requests for additional staff, men were transferred to the railway making the application. That point was not considered at present. For instance, if an application was made for two officers on the Eastern Bengal State Railway, the men to be transferred should be very junior men, so that the number of senior assistants would not be increased on the Eastern Bengal State Railway, where there was already a larger proportion than there was on the other two lines. That meant less officiating appointments. On the Eastern Bengal State Railway itself there were seven officers, senior to officers on the Oudh and Rohilkhand and the North Western Railways, who were working as assistants, and their juniors on those two lines had charge of districts at an increased rate of pay. Had the distribution of those senior men been more even, some of those seven men would have been on the other two railways officiating in charge of districts, and drawing higher rates of pay. The relative position of men was not considered when officers were transferred from one railway to another. He agreed it was really an administrative question.

81,289. Promotion from grade to grade did not depend upon death or retirement, so that practically there was a time-scale system in vogue in the department.

81,290. With regard to the first of the four suggestions made for the improvement of the Provident Fund, the half month's salary would be reckoned at the rate of salary which a man was drawing at the time of retirement. With regard to the fourth proposal, it should be made compulsory on the members to contribute up to one-eighth.

81,291. (*Sir Theodore Morison.*) The Government contribution should be cent.. per cent., whether it was to be one-eighth or one-twelfth. He preferred a pension to the Provident Fund, because better terms were obtained from a pension. If a Provident Fund could be established on anything like an equality with a pension it would be just as satisfactory. He favoured the pension scheme, because the old scale of pensions was better than the present Provident Fund.

81,292 (*Mr. Chaubal.*) There was nothing to prevent an officer calling in a private practitioner, and he could call in assistance which might not be so costly as the service of a Civil Surgeon.

81,293. (*Mr. Sly.*) The rule was that when a Royal Engineer entered into civil employment his date of entry into civil employment was put 2½ years after his first commission. There was no objection to that rule. The objection was to a man who, after he had served in the Public Works Department or on the Railways in the position of Assistant Engineer at a salary of Rs. 500 a month, was brought into the Traffic Department as a district officer on a salary of Rs. 700, when there were men in the Traffic Department on salaries of Rs. 550 who were available for the post. The argument was that the Royal Engineer officer should go into the grade which corresponded to that which he was in prior to his entering the department.

81,294. His department had not considered the possibility, as an alternative to the suggestion that furlough allowance should be increased from half to three-quarters of the salary of a commutation of periods of furlough into shorter periods of full pay on leave. The witness would like to study that point before saying whether it would be accepted as a more suitable method of securing the same object.

81,295. He had had experience of the recruits to the Traffic Department recently appointed from England. In his opinion they were satisfactory, and the system of recruitment was attracting the right stamp of man He could not say whether there had been any improvement in the class of recruit's consequent on the improvement in the conditions of service made in 1911; he did not think the improvement had yet had time to show itself.

81,296. The department's rules provided for two distinct qualifications for admission to the department, namely, two years' practical experience of work in England, or a diploma of a recognised University in engineering or commerce, but the rules had not been in force long enough to enable him to express an opinion as to which method was the best form of recruitment.

81,297. (*Mr. Fisher.*) His colleagues would agree with his preference for a pension to a Provident Fund.

81,298. A good general education was the best preliminary form of training for the Traffic Department. There were 12 Indians in the department. The highest salary which an Indian was drawing at the present time was Rs. 900 or Rs. 1,000.

81,299. An educational qualification was insisted upon in the case of Indian candidates for the Traffic Department, but he did not know what that qualification was. He was not satisfied with all the Indians in the department. He thought the selection of Indians should be more carefully made than it had hitherto been in one or two instances. One consideration should be the social position of the Indian. An Indian on a railway was in charge of a district, and had a very large number of Indians working under him, and it was very important that Indians selected for the charge of a district should be those whom their subordinates would learn to respect.

81,300. (*Mr.* Madge.) There had been no recent cases of Royal Engineer appointments similar to those complained of in the written statement. He was only referring to past history, because there was a possibility of such cases occurring again, and it was the wish of his colleagues to prevent that.

81,301. (*Sir Valentine Chirol.*) No reason had ever been assigned, to the witness's knowledge, for making the rate of interest paid to the Provident Institution $3\frac{3}{4}$ per cent. as against 4 per cent. on deposits in the General Provident Fund.

(The witness withdrew.)

S. A. J. KEATINGE, ESQ., Chief Storekeeper, North Western Railway.

Written Statement relating *to the* Railway Department, *being a Memorandum on the Conditions* of *Service, Methods of Recruitment, &c.*, of the *Gazetted Officers* of the Stores Department. *Indian State Railways.*

81,302. **(I.)** Methods of recruiting.—At present, Officers from other Departments and Railways are appointed, young men educated in India and England are nominated in India on probation and subsequently confirmed; subordinates of the Stores and other Departments are also promoted to Gazetted rank.

There has been no recognised system in recruiting Officers, and the existing methods have not in all cases proved successful. It is felt that it would be more satisfactory if appointments were made from men who have had a good sound English education, combined with Commercial and Mechanical training in some large works, the proportion of such appointments being half recruited in England and half selected in India. A few of the appointments should also be reserved solely for subordinates of the Stores Department and no subordinates from other Departments should be admitted.

81,303. **(II.)** System of training and probation.—There are no special methods of training either prior to or after joining the Department. Officers attain proficiency from experience gained from day to day in the several branches of the Department. The process of training is in fact practically the same as that obtaining in the Traffic Department. It is however suggested that Stores Officers should undergo an examination for promotion according to the system adopted for the Traffic Department.

81,304. **(III.)** Conditions of service.—The conditions of service should be exactly similar to those prevailing in the Traffic and Locomotive branches of State Railways. The isolation of the Stores Department from the other Superior Revenue Departments of State Railways and the disproportion of the scale of salaries as compared with that brought in for other Departments of the Superior Revenue Establishment. has caused considerable dissatisfaction amongst the Officers of the Stores Department, and in addition, Stores Officers are being superseded in their own Department by Officers being foisted over them from other Departments which has given rise for further grave discontent. This alteration in the conditions of service in the Stores Department is unjustifiable, as all Officers of the Stores Department in the performance of their duties exercise the same standard of abilities and acumen as any Officers of other Departments of the Railway.

81,305. **(IV.)** Condition of salary.—The present scale of salary is wholly inadequate. While the scale of salaries of other Departments has been increased, that of the Stores Department has, for unexplained reasons, been ignored. This feature is only present in the case of the Stores Department of State Railways. Railways worked by Companies have long since recognised the necessity for improving the position of the Senior Officers of the Stores Department, and while State Railways pay their most Senior Officers only Rs. 1,100 per mensem, the undermentioned Railways have increased the salaries of their Senior Officers to the amounts detailed below:—

	Rs. Per mensem.
E. I. Railway	1,750
B. B. & C. I. Railway .. .	1,400
G. I. P. Railway	1,400
B.-N. Railway	1,400
South Indian Railway	1,200

Chief-Store-Keepers are Heads of Departments and Administrative Officers, yet they are not paid even the salaries of an Executive Engineer in charge of a few hundred miles of maintenance. To illustrate some of the responsibilities of Store Officers, it may be mentioned that the annual purchase of Stores in India for the Eastern Bengal State Railway amount to 30 to 40 lakhs of rupees per annum, for which the Chief Store-keeper is responsible. Besides this he has to estimate and provide for English stores to the extent in value of 60 to 65 lakhs per annum, and, in addition, has, in his custody and under his control, stores valuing more than a crore of rupees.

The Junior Officers of the Department exercise these duties and responsibilities in a lesser degree according to their respective charges, but they are liable to acquire the whole of them in process of time. It is an anomaly bordering on unfairness, to treat Stores Officers in point of salary, position, or promotion, in any way different to Traffic Officers. in fact, what is wanted is equity and not a distinctive difference. It may be urged or alleged, that Officers of the Stores Department undergo no professional or technical training, and although this may be true in the case of some Officers, yet absolutely the same conditions prevail in the case of Officers of the Traffic Department who may rise to Rs. 2,000 per mensem, while a Stores Officer cannot hope for more than Rs. 1,100 under the existing conditions. The necessary qualifications of both Departments are chiefly, acumen, judgment, ability to control and general abilities; and although differently applied, are essentially of the same standard in both Departments, with the exception that the extent of responsibilities for expenditure of funds and custody of property are far greater and of a more onerous nature in the Stores Department than they are in the Traffic Department. A spending Department requires keener attention and. supervision than an earning Department, and therefore its Officers should be paid as well as those of a Department that controls expenditure only in respect to cost of staff and working expenses. The members of almost every service in India have within recent years had their positions and scales of salaries improved, chiefly on grounds of increased cost of living in India, but an invidious and unreasonable exception has been made in the case of the Stores Department of State Railways, although the same reasons and conditions are equally applicable to the members of that Department.

81,306. **(V.)** Conditions of leave, and **(VI.)** Conditions of pension.—(Under these two headings Mr. Keatinge's recommendations are the same as Mr. Biernacki's—*vide* paragraphs 81,258–59).

81,307. **(VIII.)** Any other points within the terms of reference to the Royal Commission not covered by the preceding heads.—*Appointment at the India Office.* Officers of other Branches of the Railway have opportunities of securing employment at

Home, either prior to or after retirement, but no Stores Officer has yet been able to secure any employment at Home. The experience gained by Stores Officers, of conditions prevailing in India and the suitability of supplies, would be of great service to the Stores Department of the India Office, and if at least one appointment in any capacity at the India Office, could be reserved for Officers of Indian State Railways, it would be a great incentive to Officers in India, and also result in considerable benefit to Government.

The question of Medical attendance.—(Under this head Mr. Keatinge's recommendation is the same as that of Mr. Biernacki—vide paragraph 81,261).

MR. S. A. J. KEATINGE called and examined.

81,308. (*Chairman.*) Witness had been twenty-seven years in the Stores Department of the State Railways, previously having been in the Stores Department of the Punjab and Delhi Railway. He was now Chief Storekeeper on the North Western Railway. He represented twenty officers of the Stores Department, and the opinions expressed in the written statement were representative generally of their views. He put in a memorandum* detailing the duties of Chief Storekeepers and Storekeepers.

81,309. The existing methods of recruitment had not been altogether successful or satisfactory; recruitment should be from men with mechanical and commercial training. At present the officers were practically all Europeans and Anglo-Indians recruited in India, only one being an Indian. Some were young men who had been educated at home. The selection was made by the Railway Board, and there was no examination. A recruit served a certain probationary period in the department, and if satisfactory was subsequently confirmed in his appointment. The Board did not obtain men direct from England, but from amongst those who were seeking employment in India and men in other departments of the railway were also promoted to the Stores Department. The age of recruits varied from nineteen to twenty-four.

81,310. When men first entered the department they had no knowledge of the materials and stores with which they had to deal, and no knowledge of accounts; they had to acquire their knowledge after entering the department. He advocated a training before service, and preferred men who had served an apprenticeship of two or three years on the mechanical side in large works in England, and about eighteen months on the commercial side of places like the Thames Iron Works or Dubs of Glasgow. On coming out to India the recruits should be sent to some large works, such as the construction of a bridge, and then be given six months' work in the Examiner of Accounts' office, and afterwards be drafted into the Stores Department. Selection as adopted in the Traffic Department would be the best method. It might be possible for the India Office to advertise for men, in which case the selection would remain with the Secretary of State; but some appointments could be made in India of men having the necessary qualifications. The Railway Board would select only in the case of men available in India. There was no objection to appointing qualified Indians, but he had come across no Indian who had both mechanical and commercial experience. Mechanical training was essential for a storekeeper. He did not think the training could be obtained at Rurki so well as in a large railway workshop.

81,312. The Stores Department was a small one. Vacancies were very rare, and the pay was low.

81,312. It would be a good thing to have Royal Engineers in the department, but he doubted whether they would come in on the present pay. The training of a Royal Engineer was suitable for the work of storekeeper.

81,313. Officers in the department should be as highly paid as officers in the Traffic Department., because the methods of recruitment were on the same lines and the responsibilities were practically the same. He was not familiar with the salaries paid on railways in England, but he believed the Chief Storekeepers of the Midland Railway and the London and North Western Railway received $1,200 a year.

81,314. Since the written statement had been sent in the pay of Chief Storekeeper had been raised to Rs. 1,500 in the case of the North Western, Rs. 1,400 in the case of the Eastern Bengal, and Rs. 1,250 in the case of the Oudh and Rohilkhand. That, however, did not meet the case, as the scale of pay was still below that of the Traffic Department. Also the pay of the Storekeeper and Assistant Storekeepers should be raised. The right kind of man would not be secured until the salary was increased.

81,315. He had no knowledge of the reason for which special bonuses were given to subordinates and not to superior officers of the State Railway Revenue Establishments.

81,316. In connection with the Provident Fund there was already permission for deposits to be made to a limit of Rs. 3,000, but he did not know what advantage was taken of that privilege. He proposed that a 12½ per cent. contribution should be compulsory after a certain period of service.

81,317. The department might be made more attractive if a post in the Stores Department of the India Office were offered to the Stores Department in India. No officer had been transferred from India to that department during the last thirty years, but he had been informed in England that it would be very useful to have an officer in England with Indian experience. The staff at the Indian Office consisted of the Director General, Deputy Director General, a large staff of inspectors, a Superintendent, and Assistant Superintendents.

81,318. (*Sir Murray Hammick.*) It would be possible to recruit Indians and send them to England for two years if the right class of man could be obtained. The only Indian Storekeeper was a man of long service who had been transferred from another department, and he had been in the Stores for ten years.

81,319. Men recently appointed started on Rs. 150. Some of them were pure Europeans whose parents were in the country, and one or two were Anglo-Indians.

81,320. (*Mr. Madge.*) It was essential that an officer of the department should know all the different parts of locomotives, carriages, wagons, bridges, &c., and of the plant used on works, from a steam hoist to a portable engine, and without some mechanical training it was impossible for him to acquire that knowledge. The department had no responsibility for the selection or manufacture of material except in regard to what was bought in India by the Stores Department. A portable engine, for instance, mould be sent into the locomotive shops for testing. An officer was continually taking in and issuing material, and needed to have a knowledge of all the things he handled.

81,321. The reference in the written statement to the isolation of the Stores Department referred to the fact that before March, 1912, the department was paid on the same scale as the Locomotive Department and the Traffic Department but after that date the scale of both those departments were increased without any increase being made in the Stores Department.

81,322. A short time ago an officer from another department was given an officiating appointment, and this was much resented by the junior officers.

81,323. The pay of the Chief Storekeeper on the East Indian Railway, Rs. 1,750 a month, was practically the same as the Chief Storekeeper would receive in England, but it included Rs. 250 personal allowance. He did not ask for an increase in the pay of the department as a kind of foreign allowance, but on account of the fact that the officers were insufficiently paid.

81,324. (*Mr. Fisher.*) The Stores Department was a spending department though it did not make payments. He himself had the spending of thirty to forty lakhs of rupees a year.

81,325. (*Mr.* Sly.) The transactions of the Stores Department in England were not on the same scale or on the same lines as those of railways in India.

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* **Appendix** No. VI.

In England very large stocks were not maintained because the market was practically on the spot and anything needed could be obtained almost at once. The Indian Railways had to obtain large stocks, and requirements had to be forecast eighteen months ahead.

81,326. The Stores Department was a very small department on the State Railways. There were five officers in the department of the Eastern Bengal State Railway. An Assistant Storekeeper, if a good man, obtained promotion after from one to three years in each grade, irrespective of the number of vacancies in the grade. The only selection post was that of Chief Storekeeper. No storekeeper, according to the present scale, could rise over Rs. 950; the Chief Storekeeper could rise to Rs. 1,500. For the Storekeeper and Assistant Storekeepers the number of appointments was not fixed, but there was a cadre for each railway. Recently an officer on the Eastern Bengal Railway was transferred to the North Western in order to get promotion. He had not considered any proposal for substituting a time-scale of pay instead of classes throughout the service.

81,327. (*Mr. Chaubal.*) He was not satisfied with the present system of recruitment because there was no recognised standard of sound English education and commercial and mechanical training. The men who were now recruited obtained their training after they entered employment. Seven years' actual work in the department was required before men could be said to be properly qualified for the work. The combination of qualifications required for the department was rather difficult, but the necessary mechanical training could be acquired in railway workshops and in the Accounts Department of railways. He was not in a position to say why no more Indians had been appointed.

81,328. (*Sir Theodore Morison.*) The inspection of stores purchased by the department was generally done at headquarters. Stores were also inspected by the Superintendent of Local Manufactures, who had a laboratory in which to apply physical tests. The men who had recently been appointed to that office had come from the Engineering Department and were not in the Stores Department at all. When the Stores Department placed an order in Calcutta for certain articles manufactured in that city a copy of the order was sent to the Superintendent of Local Manufactures in order that he might inspect the article before it was sent in. That was a satisfactory arrangement and in accordance with the recommendation of the Stores Committee, which investigated the question of encouraging local industries in 1907. One Superintendent was stationed in Bombay and one in Calcutta, the two largest manufacturing towns. The Superintendents, being engineers, received the salary of their grade.

81,329. An officer who had to retire at the age of fifty-five would be very suitable for appointment to the India Office at home. At present the training in the Stores Department in India would not be sufficient to equip a man for an Inspectorship in England, but there were other posts at the India Office in which an official from India would be very useful.

81,330. (*Lord Ronaldshay.*) He himself had no commercial experience when recruited to the Stores Department. He felt it would have been better for him if he had.

(The witness withdrew.)

F. H. BIBRA, Esq., Executive Engineer, Eastern Bengal State Railway.

Written Statement relating to the Railway Department.

81,331. The Temporary Engineers at present employed on the three State Railways, *viz.*, the North-Western, the Eastern Bengal, and the Oudh and Rohilkhand hold 51 appointments.

81,332. **(I.)** Method **of** recruitment.—The service is divided into three rigidly distinct classes, which may be termed Imperial, Provincial, and Temporary, the modes of recruitment for each class being different. In the case of Temporary Engineers, recruiting is done in this country, all appointments being sanctioned by the Railway Board. Some men are appointed direct by the Board; others are appointed on the recommendation of the Agents of the three State lines. Some of the men are trained in England, and some in this country. The majority trained out here are from one or other of the Indian Engineering Colleges.

Recommendations.—Temporary Engineers are called upon in the course of their employment to perform duties which are similar in all respects to those of Engineers on the permanent cadre, and it is essential therefore, that the same standard of training and ability should be required of them as is prescribed in respect of the latter class. It is submitted that, for the advantage of the service and to give equal opportunities to all alike, there should be but one mode of recruitment, and that is by selection from the open professional market. There should, be two Committees of selection—one in England, and one in India, for English and Indian appointed Engineers respectively. For Indian appointed men, it is necessary to place them on a year's probation prior to being selected for permanent appointment in the Department. At the end of a year's practical training on works, if an officer is found suitable, and is well reported on, he should be confirmed but not otherwise.

81,333. **(II.)** System **of** training **and** probation.—*Training.*—Temporary Engineers, as appointed on State Railways, may be divided into two classes as regards training, namely—(*a*) men appointed direct from college without any practical training whatsoever on works, and (*b*) men who have had considerable experience on other Railways or works, prior to being appointed to a State Railway as a Temporary Engineer.

Probation.—As regards probation, Temporary Engineers have no probationary period, being appointed merely on the footing of monthly servants.

Under the conditions governing (*a*), if a junior Engineer, direct from College possessing the necessary qualifications for employment, is appointed as a Temporary Engineer either on Construction, Survey or Open Line, he should at the end of a year's probation, be reported on by the Divisional Officer under whom he has served as to his fitness for further employment or otherwise. If the report is satisfactory, and it is endorsed by the Engineer-in-Chief as such, he may, if his services are still required, continue to serve for as long as there may be work to employ him. At the end of three years—including the probationary period—if the officer is still in service and his annual confidential reports are satisfactory, he may be brought on to the permanent non-pensionable cadre in the Superior Revenue Establishment.

Under the conditions governing (*b*). *i.e.*, for officers already in the service, Government can and do, pick up good men with considerable Indian experience, and there is no reason why such men, if found thoroughly reliable and capable, and have by years of good work proved their worth, should not after a period of say five years' unbroken service be brought on to the permanent non-pensionable cadre in the Superior Revenue Establishment of State Railways, and be placed on the same footing as Locomotive and Traffic Officers.

81,334. **(III.)** Conditions **of** service.—The service of a Temporary Engineer has, under existing conditions, no permanence whatever. By the declaration which he is required to subscribe (vide Annexure A), he admits he is liable to dismissal at any time on being served with **a** month's notice. The declaration also contemplates the termination of his service without notice upon the completion of the particular work for which he may have been engaged. These conditions are anomalous in the majority of cases and the term "Temporary" is a misnomer, for in practice it is seldom that the services of a Temporary Engineer are thus summarily dispensed with; on the contrary upon the completion of the work to which he was originally deputed, he would, if he performed his duties satisfactorily, be transferred to some other work. **A** Temporary Engineer is rarely dismissed, except in consequence of an unfavourable report by his superior officer as to his competence, and thus it is conceivable that he might, despite the misnomer "Temporary," be retained in the service for a period equivalent to that for which he would have served if he had originally been appointed to the permanent cadre. But in addition to the insecurity of his tenure of office, a Temporary Engineer. is under a disadvantage as compared with a permanent officer in that—(a) he is liable to be superseded by a Permanent officer who is his junior in service, when the latter becomes according to the conditions of his service entitled to Divisional charge; (in fact, there have been instances of such supersession); (b) he cannot claim as a right a Divisional-charge even though by seniority or length of service he may be fully qualified for it; (c) he has no certainty of prospects or any claim to promotion from the beginning to the end of his service however lengthy or meritorious it may have been.

Conditions such as the above are unjust and inherently unfair to any body of public servants, and I venture most emphatically to submit that such treatment is neither equitable nor in its principles productive of sound ungrudging service; whilst the liability to be discharged without fault or assigned reason on receiving a month's notice, after long years of approved service is a dread, an anxiety, and, in effect, an undeserved stigma of inferiority which no public servant of such approved service ought for a moment to be called upon to suffer.

It is true there are instances where Temporary Engineers have held Executive charge, and do hold Executive charge now, but such cases are chiefly on construction. I give in Annexure B a list of names of Temporary Engineers employed on the three State Railways, showing their total service, salary, present rank, and how employed, as corrected up to the 31st December 1913, vide Railway Board's Classified List.

Recommendations.—It is recognised that, in dealing with the question of Temporary Engineers as a collective body, it is not possible for Government to guarantee permanent appointments to all of them, for the' simple reason that the number of cadre appointments are limited, and the Temporary Engineer service must necessarily be a service capable of being .expanded or contracted as the case may be, to supplement the permanent staff when a new Railway has to be built, or a Survey for a proposed Railway has to be carried out requiring additional staff. But it is submitted that no less than 38 Temporary Engineers have hitherto held, and are now holding Open Line cadre appointments (see Annexure B.), and it is felt that in common justice to the claims of those officers so employed, whose services have been duly approved, and who have five years' service and over, should forthwith be brought on to the Superior Revenue Establishment of State Railways and be placed on the same footing as Locomotive and Traffic Officers on the permanent non-pensionable cadre.

For the more junior men already in the service with less than five years' service, it is suggested that each man's case be dealt with on its merits. If at the end of five years' approved service it is considered an officer is fit for further employment and is still retained? he should be brought on to the permanent cadre.

In the case of future appointments, it is suggested that the system of monthly service should be replaced by one where under Engineers of this class may attain the same status as those officers on the non-pensionable superior Revenue cadre—with this view, it is proposed that future appointments 'should be covenanted for a period of three years' inclusive of one year's probationary period, and that his services may he dispensed with summarily if. during such period, he shall not be found to have performed his duties satisfactorily. Further, that if by the end of three years he succeeds in passing the prescribed Examinations as laid down for the permanent staff, he shall be transferred into the permanent cadre in the same grade as that which he then holds in the Temporary service. If, however, it so happens that a Temporary Engineer has to be discharged owing to a reduction of establishment on the eve of having completed his three years' service, it is fair that Government should give him at least six months' notice of termination of service in order to enable him to look out for employment elsewhere. In all such cases it is suggested that the Railway Board be asked by the Agent of the Railway concerned to register the name of the officers so discharged for re-employment on some other work on the first opportunity that officers; preference may be given to an officer already in India over a new appointee from England.

The carrying out of the above proposals may be facilitated by reserving, say two appointments yearly when the annual recruitment to the permanent pensionable establishment is made.

In the case of officers under class (*b*), referred to above (para. 81,333), it may here be mentioned that the K. S. Railway Company Engineers, Messrs. A. E. B. Sullen and D. H. Wilson, have already been brought into the permanent non-pensionable Division. As regards seniority, if for any reasons, it be not possible to count the previous period of service in full, a very generous calculation should at least be made.

81,335. (IV.) Conditions of salary.—The existing conditions of salary are unsatisfactory for the following reasons:—

(*a*) that *a* Temporary Engineer has no claim to any annual increment of salary, and

(b) that local allowances (such as Presidency allowance, Assam allowance, Jalpaiguri Duars allowance, Frontier allowance, &c.), can be obtained only as a special concession.

The salary on first appointment of officers under class (*a*), *i.e.*, direct from College, is fixed by the Agent or Railway Board, as the case may be, and varies between Rs. 250 and Rs. 300 per mensem.

Under class (*b*), *i.e.*, officers with previous experience on other Railways or works, their salaries are fixed on the market value of their worth, and may vary between Rs. 500 and Rs. 600 or more.

Increments to salaries may be granted as recommended from time to time by the Head of the Department, or Agent, as the case may be, to the Railway Board. There is no fixed annual scale of increment as in the case of Permanent Engineers. The result of such a procedure is, some men have done fairly well, but the majority are underpaid compared with permanent officers.

We draw attention in particular to the following officers*:—

	Service.		Salary.
	Y.	M.	Rs.
1. D. A. Marriott	24	7	750
2. H. S. Wells	17	8	650
3. A. W. King	15	3	600
4. G. W. Meares	15	0	550
5. A. McInerny	12	1	500
6. F. B. Martin	11	3	550
7. A. G. Grant	8	6	460
8. E. J. C. Patterson ...	7	3	450

Recommendations.—The salary of a temporary Engineer should in every case be fixed irrespective of any local allowance, and he should become entitled to a local allowance *ipso facto* on his appointment to the locality in respect of which the allowance is granted.

In the case where an Engineer under class *(a)* (para. 81,333) is first appointed direct from College or from a practical training course, his initial salary should be the same as that of an officer of the Superior Revenue Establishment on first appointment. But where under class (*b*) he has had previous practical experience, his initial salary should be determined with due regard to such experience. Subsequently in both cases his salary should advance by the like annual increments as are allowed to officers in the Superior Revenue Establishment.

A system, if adopted, whereby annual increments are granted to Temporary Engineers as is followed in the case of Permanent Engineers, would be far more satisfactory to Government as well *as* to the staff concerned, and it is only right and fair that temporary men, who do precisely the same work as permanent men, should draw at least the same pay that Traffic and Locomotive men draw in the Superior Revenue Establishment of State Railways, but I consider that purely temporary men should draw even more.

81,336. **(V.) Conditions** *of* leave.—Temporary Engineers are granted privilege leave and furlough under the following conditions:—

(*a*) Article **242** (*a*), Civil Service Regulations, which provides that a Temporary Engineer is not entitled to privilege leave, unless his duty can be provided for without additional expense to the State.

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* See also Mr. Ryan's **Statement on** page 103.

† Temporarily **draws** Rs. 650 while employed beyond the Frontier.

(*b*) Under Article 336(1), Civil Service Regulations, a Temporary Engineer may be allowed sick leave only if no additional expense be occasioned to the State.

(*c*) Under Circular No. 1889 G., dated 1st July 1898, of the Government of India, Public Works Department, Temporary Engineers may be allowed long leave as an act of grace.

Recommendations.—Officers of the Superior Revenue Establishment, State Railways, come under the Civil Service Regulations as regards leave. Officers appointed in England come under the European Service Leave Rules, and those appointed in India under the Indian Leave Rules until they reach the Rs. 800 grade.

It is submitted that the same conditions of leave should be prescribed for Temporary Engineers as those which obtain in respect of the Superior Revenue Establishment. With regard to (a) there should be no qualification. It is felt, that while leave should not be claimed as a right, there should be a reasonable chance of getting it when due, and that privilege leave refused should not be forfeited but should accumulate beyond three months. The strength of the establishment should be such as to permit of leave being granted in accordance with the rules. Under (*b*) this rule involves undue hardship, Temporary Engineers being in many cases posted to Construction works where conditions of life are unfavourable to health. The conditions as to sick leave should be, therefore, similar to those applied to the Superior Revenue Establishment. Under (*c*) there should be no qualification such as granting of long leave as an "act of grace." Under Indian Leave Rules furlough for one year after ten is granted. This latter is much too long a period and should be the same as is prescribed for the European Leave Rules, *viz.*, furlough for one year after eight years' service. This at any rate should apply to Europeans.

Many officers break down in health even with eight years as the limit for long leave, and the privilege leave cumulative to three months taken out of India is insufficient to prevent this. The general opinion is that more leave is necessary prior to the completion of eight years' service, and we strongly endorse the opinion of the men in the Superior Revenue Establishment, namely, that six months' combined leave after the first four years' service should be permissible, the furlough portion of the combined leave could then be deducted from the leave due after eight years' service.

81,337. **(VI.)** Conditions of pension.—Temporary Engineers are debarred from pension by the terms of their service, but Open Line men are admitted to the State Railway Provident Fund Institution.

Recommendations.—It is recommended that they should be entitled to greater participation in the benefits of the Provident Fund, and the following is suggested:—

(*a*) Under existing conditions only those Temporary Engineers whose pay is chargeable to Revenue are privileged to subscribe to the State Railway Provident Fund, except a Temporary Engineer transferred in the interests of the State from a Revenue work to Construction work, who is permitted by special sanction to continue his contribution. It is desirable in all cases, where possible, that the privilege of contributing to the State Railway Provident Fund be granted to all Temporary Engineers whether employed on Construction, Survey, or Revenue work.

(*b*) All the privileges and conditions for the time being in force in regard to participation in the State Railway Provident Fund by officers of the Superior Revenue Establishment should be made applicable to Temporary Engineers without restriction. It is felt that in order to make the Provident Insitution give benefits equal to a pension, which it is intended to substitute, it is necessary—

(i) That subscribers after 10 years' service should be permitted to contribute at the rate of one-eighth of their salaries and receive the bonus thereon.

(ii) That the half-yearly bonus on amounts subscribed be fixed at 100 per cent., instead of being dependent as at present on the fluctuations of ratio of working expenses to gross earnings which is unfair to the staff, as such fluctuations are largely due to causes outside their control.

(iii) 4 per cent. interest to be paid on the Provident Institution Funds, instead of 3¾ per cent. as paid at present.

(iv) In addition to the Provident Fund Institution, Government has sanctioned for the subordinate members of the State Railway Revenue Establishments having 15 years' service and over, half a month's pay for each year's service up to 30 years; this is in recognition of the fact that although expressly devised to take the place of pension, the Provident Institution has failed to do so adequately. The result is that Gazetted Officers of the Superior Revenue Establishment of State Railways are now comparatively in a much worse position than their subordinates in respect to their pension for retirement, although subscribing to the Provident Institution on the same basis as the subordinates, while their position, as compared with pensionable State Railway officer, is still more deplorable.

There should surely be no difference between the treatment of officers and subordinates in the matter of a gratuity, and common equity demands that officers should get it in the same way that the subordinates do. It may be mentioned here that even the daily paid labourers, who do not subscribe to the Provident Institution, are now getting it, and it thus follows that if the officers of the Superior Revenue Establishment of State Railways are admitted to the gratuity scheme, those Temporary Engineers who have earned it should on retirement also be admitted to the same scheme.

81,338. **(VII.) Such limitations as may exist in the employment of non-Europeans and the working of the existing system of division of services into Imperial and Provincial.**—This is a matter that does not concern Temporary Engineers, and as such is outside the scope wherein as a witness I am called upon to offer remarks.

81,339. **(IX.) Any other points within the terms of reference to the Royal Commission not covered by the preceding heads.**—We have already noted the grave anomaly (to use no stronger phrase) of Government continuing to term as "Temporary" servants who have periods of unbroken employment extending over 10 and up to 24 years, and persistently failing to accord to such men of impliedly approved service reasonable prospects for *good* work done.

As already stated, Temporary Engineers number 51. The North-Western Railway having 24, Eastern Bengal State Railway 24, and Oudh and Rohilkhand Railway 3. This represents something like 28 per cent. of the total number of Royal, Imperial, and Provincial Engineers employed on State Railways.

Temporary Engineers are called upon in the course of their employment to perform duties which are similar in all respects to those of Engineers on the permanent cadre, why then should deserving officers from the ranks of Temporary Engineers not be selected from time to time for permanent employment? It is a method of recruitment that must bring good men into the service.

As may be expected, there is much opposition on the part of Permanent Engineers to the admission of a "Temporary" Engineer on to the permanent cadre, because it is said such a procedure blocks promotion for permanent men already in the service. This may be overcome by increasing the Engineering Establishment on State Railways, and also by temporarily stopping or diminishing recruitment to the permanent pensionable establishment when necessity arises.

ANNEXURE A.

DECLARATION.

I DO hereby declare that I dearly understand that my employment on the——————Railway as a Temporary Engineer is subject to the conditions for the employment of the Temporary Engineers as laid down in the State Railway Construction Code, Chapter VII, paragraph 580, Rule IV, that is to say, that I am on the footing of a monthly servant and that my appointment carries with it absolutely no claim to pension or to any absentee allowances beyond those conditionally given by the rules of the Civil Service Regulations to temporary employés, that it is terminable without notice or pay in lieu of notice if my services are dispensed with for serious misconduct, and that it is terminable on a month's notice or pay in lieu of notice if my services are dispensed with otherwise than for serious misconduct before the completion of the work for which my services have been engaged, but otherwise with or without notice my engagement terminates when the work for which I am engaged ends.

I also clearly understand that, should I desire to resign my appointment, I shall be required to give a month's previous notice of my intention to do so or forfeit a month's pay in lien of such notice.

Temporary Engineer.

Date the——————1912.

ANNEXURE B.

LIST OF *TEMPORARY* ENGINEERS.

(Corrected up to 31st December, 1913.)

Open Line Cadre Appointments.

District on which employed.	Name of Officei.	Destination and charge.	Pay on 31st Decembe 1913.	Period of service on 31st December 1913.	
E. B. S. RAILWAY.			Rs.	Y.	M.
Engineer-in-Chief's Office	Le Patourel, P. D. L.	Drawing Office Superintendent	300	0	4
Calcutta District	Bibra. F. H.	Executive Engineer	1,050	18	0
	Chaudhury, S. C.	Sub-Divisional Officer	350	4	7
Ranaghat District	Korgaokar. H. K.	Do. do.	250	1	7
	McInerny, A.	Do. do.	500	12	1
Rajbari District	Patterson. E. J. C.	Do. do.	450	7	3
	Dutt. Divakar	Do. do.	250	2	0
Saidpur District	Bell, W. C.	PO. do.	250	0	11
	King, A. W.	Do. do.	600	15	3
Katihar District	Bewley, W.	Executive Engineer, Metre Gauge	800	9	3
	Edmonds, A. M.	Sub-Divisional Officer	350	2	0
	Powis L. J.	Do. do.	250	0	5
Lalmanir Hat District	Angell. C. H.	Engineer-in-Charge, Raja Bhatkhawa-Dalsingpara Branch.	650	9	11
	Rego, A. C.	Sub-Divisional Officer	400	0	9
Dacca District	Rossetto, F. A.	Do. do.	450	0	6
Lent to Constrnction	Rose. J. N.	Personal Assistant to Superintendent of Works, Extensions.	500	*10*	*0*
N.-W. RAILWAY.					
Engineer-in-Chief's Office	Marriott, D. A.	Personal Assistant to Deputy Engineer-in-Chief (Central Section).	750	24	*7*
	Lane, T. R. P.	Personal Assistant to Deputy Engineer-in-Chief (Southern Section).	550	8	4
	Cracker, P. W.	Sub-Yivisional Officer (Sleepers)	350	3	8
Kohat Thal Railway	Martin, F. B.	Fuperintendent	550	11	3
Jhelum District	Bright, A. J.	Sub-Divisional Officer	40u	1	10
Lahore District	Sankey, W. It. W.	Do. do.	500	2	7
	Prnce E. L.	Do. do.	350	1	11
	Greene, A.	Do. do.	3.50	3	2
Saharanpur District	Waite, C. S.	Do. do.	600	2	4
	Irani, M. H.	DO. do.	550	9	0
Ferojpur District	Oram, F. J.	Do. do.	500	1	0
	Watts, R. W.	DO. do.	450	2	10
Multan District	Marshall, A. D.	Do. do.	400	2	0
	Atherton, P. W.	Do. do.	500	2	2
Sukkur District	Grant, L. H.	Do, do.	400	2	10
	Sawhney, B. It.	Do. do.	400	0	10
Karachi District	Mandhato, H.L.	Do. do.	350	2	11
Quetta District	Meares, G. W.	Do. do.	650	15	
	Grant, 'A.G.	Do. do.	450	8	6
On leave	Wells, H. S.	Do. do.	650	17	8
	Amesbury, W. A.	Temporary Engineer	550	4	6
Lent to C. and W. Dept.	Webster, H. J.	Do. do.	400	1	10

Construction.

District on which employed.	Name of Officer.	Destination and charge.	Pay on 1st Decembe 1913.	Period of service on 1st December 1913.	
E. B. S. RAILWAY.			Rs.	Y.	M.
Sara-Santahar Broad Gauge Construction.	Chatterjee, B. N.	Executive Engineer	750	2	9
Mymensingh-Tangail Railway Survey.	Morgan, C. H.	Snb-Divisional Officer	600	1	7
	Sahgal, H. N.	Do. do.	275	*2*	*4*
	Pogo—, F. D.	Assistant	250	1	10
Works Division II.	Sunder Singh, Rai Sahib	Sub-divisional Officer	750	1	9
Sara-Serajganj Construction	Nunn, J. W.	Executive Engineer	1,000	5	2
Lower Ganges Bridge.					
Chur Division	Delanougerede, R. A.	Do. do.	1,100	12	*0*
Calcutta Chord Survey.	Singh, Gourbux	—	250	1	*0*
N.-W. RAILWAY.					
Administration	Mayer, J. J.	Personal Assistant to Engineer-in-Chief	600	1	11
Kalabagh Bannu Railway	Sullen, E. S.	Sub-division Officer	450	3	9
OUDH ROHILKHAND RAILWAY.					
Cawnpore Banda Constructior	Delanougerede, V. A.	—	350	3	1
	Gilbert, C. F.	—	500	6	2
Zhob Valley Survey.	Fitzherbert, A. T.	Executive Engineer	500	7	0

Mr. F. H. **Bibra** called and examined.

81,340. (*Chairman.*) The witness said he was at present an Executive Engineer on the Eastern Bengal State Railway and had recently taken charge of the Calcutta Division. Prior to that he was Superintendent of Works extensions. He had been eighteen years on the Eastern Bengal State Railway. He represented altogether **51** Temporary Engineers of the three State Railways, and *36* out of that number were filling cadre appointments.

81,341. He believed the reasons which led to the permanent employment of so many Temporary Engineers was that Government found they were satisfactory and kept them on. The officers re-engaged every year and had to sign a declaration that their services were purely temporary when they entered the service but not every year and that they might be discharged after the work on which they were employed was completed. If a man was given a revenue appointment on the railway he stayed on year after year, though as a matter of form he had to sign a declaration only at the commencement of his service. Some of the officers set out in the list given in the written statement had occupied their posts for some years and they were definitely permanent posts.

81,342. The majority of Temporary Engineers had had an engineering training in some recognised institution. The majority of the officers were drawn from the Indian colleges, but some of them were drawn from men who had come out from England and had served on other railways or engineering works. About sixty per cent. of the men had been educated in India. Several were Rurki men who had failed to qualify for a guaranteed appointment. No rules were laid down for probation for Temporary Engineers. As a rule preference was given to men who had considerable experience of engineering work.

81,343. On the Eastern Bengal State Railway there were at present three Temporary Engineers in executive charge. On that railway the post of Personal Assistant to the Deputy Engineer-in-Chief was sanctioned as equivalent to an executive charge, but he believed this post was not equivalent to a divisional charge and one of them was held by a Temporary Engineer of over **24** years' service.

81,344. The only method of bringing Temporary Engineers holding cadre appointments on to the permanent establishment without inflicting injury on those now in the service, would be for Government to increase the Engineering establishment and to put selected Temporary Engineers of approved service say **7** to **10** years and over, into that establishment on a separate list, and to put them on the same footing as officers in the Traffic and Locomotive Departments. If a number of engineers were brought in without increasing the establishment it would probably be a hardship on the permanent men, as it would necessarily interfere with promotion, but if Government increased the establishment there was no reason why Temporary Engineers should not be put on the same footing as the Superior Revenue Establishment. The officers would depend for their promotion on the vacancies within their own particular cadre, which could be increased by so many Executive Engineers and so many Assistant Engineers. It would be impossible to make all Temporary Engineers permanent but Government might do something for men of long service who had done good work. There was one man on the North Western Railway who after twenty-four years' continuous service was still a Temporary Engineer. He was Personal Assistant to a Deputy of the Engineer in Chief which was not equivalent to Executive charge. He contributed to the Provident Fund. All the **36** Temporary Engineers filling cadre appointments had the privilege of contributing towards the Provident Fund. A Temporary Engineer employed on construction or survey was not allowed to subscribe to the State Railway Provident Fund unless he previously held a cadre appointment, in which case the Railway Board's sanction had to be obtained. The posts” included in list B in his written statement were permanent posts which if not occupied by Temporary Engineers would be within the established cadre and occupied by permanent engineers. The cadre was short of that number of posts. The majority of the posts were sub-divisional charges. It would not be possible to bring such a large number of men into the permanent service straight away, but it could be done after a certain number of years' service, say ten, one or two selected men being brought in every year.

81,345. Temporary Engineers could not obtain privilege leave unless their services could be spared without expense to the Government. Government could refuse to give leave to a Temporary Engineer whose absence might involve the appointment of another man. It was the same with furlough

81,346. *(Lord Ronaldshay.)* Comparing the position of a Temporary Engineer with that of a Traffic or Locomotive officer, the witness said that a Temporary Engineer was not paid so highly in the majority of cases and his promotion depended entirely on the report he received from his superior officer. The superior revenue establishment consisted of men, who, after serving three years' probation, were made permanent, and there was no question of removal unless an officer misbehaved himself. The Temporary Engineer, however, went on from year to year and was liable to be sent away at any time, although he might have put in eighteen or twenty years in the service. Temporary Engineers had not the same leave facilities nor the same pay as officers in the Superior Revenue Establishment and they had no security of appointment. On the North Western Railway, thirteen Temporary Engineers, some of whom had five, six, or more years' service, were given notice but most of them were taken back. It was true that the Temporary Engineer when accepting employment was well aware that his engagement might be terminated at any time, but it was not fair that men after eighteen to twenty years' service should be liable to be discharged at a month's notice.

81,347. (*Sir Theodore Morison.*) He did not think many young men left the service; the majority of officers had completed their service before they retired from it. There had been cases where men had come out for a few years and then returned to England or the Colonies.

81,348. With regard to the suggestion for recruiting the Public Works Department from Assistant Engineers brought out on a temporary agreement, he did not think many men in England would care to accept such terms. It would not be a satisfactory arrangement for a man to come out on five years' agreement with the risk of being turned away at the end of that period, if he was not found satisfactory.

81,349. The Superior Revenue Establishment was made up of cadre posts on running lines; anything outside running lines, such as construction or survey, did not come within the cadre, which was utilised simply for maintenance.

81,360. The company's lines in some cases brought out Temporary Engineers for construction or survey, and those who proved satisfactory might be taken permanently on to the staff. The company's lines had very much the same kind of problem to face as the Government railways, only on a smaller scale.

81,351. (*Mr. Chaubal.*) No limit of age was laid down for the employment of Temporary Engineers but men were not as a rule taken on after the age of fifty-five.

81,352. (*Mr. Sly.*) Out of the fifty-one engineers he represented about fifty per cent. had obtained a European training in engineering. In the list of **36** Temporary Engineers holding open line cadre appointments there were some who were holding the posts while the permanent incumbents were away on construction or other work, but that was not so in many cases. Very often Temporary Engineers were taken for construction work as well.

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* The witness afterwards wrote :—“ I find that two of the 38 appointments given in list B are not cadre appointments, *i.e.*, Engineer in charge Rajahbhat Khawa Dulsingpara branch, and Personal Assistant to the Superintendent of Works extensions.”

81,353. The increase of cadre proposed might provide a remedy for the Temporary Engineers in the service at the present time, but it would not provide a remedy for Temporary Engineers in the future. The difficulty in the future might be overcome by keeping a certain number of posts permanently earmarked. The cadre of Temporary Engineers should be kept separate, and the men should be employed on the same rates of pay as officers in the Traffic and Locomotive Departments.

81,354. (*Mr. Fisher.*) The demand for Temporary Engineers was subject to considerable fluctuation; in one year there might be a demand for as many as thirty and in another year no demand at all.

81,355. (*Mr. Madge.*) The Temporary Engineers who had failed to obtain Government appointments had not failed in the examination but were men who were too low in the list to receive guaranteed appointments. They were competent men.

81,356. There was no reason for employing Temporary Engineers except on construction or survey work, and if no such work was going on a Temporary Engineer was not employed. Some Temporary Engineers were retained for long periods because they were doing the work of permanent men. If ten new appointments were created in the cadre and ten Temporary Engineers put in to fill those appointments there would be no grievance whatever and there ought not to be any block in promotion. If the ten new appointments were merged into the regular department it would be quite satisfactory and would do away with the necessity of a separate cadre.

81,357. The reason why Temporary Engineers had not asked for pension was that Government was not inclined to bring men on to the pensionable establishment. The officers, however, would be glad to get a non-pensionable position, for the time being at any rate.

81,358. (*Sir Valentine Chirol.*) Very few Temporary Engineers, probably not more than ten per cent., had been cast adrift. Although a man had been engaged for purely temporary work, either on survey or construction, if he was found to be a suitable man he was put on to the open line. It would not be very easy for a Temporary Engineer whose services were dispensed with to find employment in India. It depended entirely on whether there was much work going on in the country or not. The Temporary Engineers shown in the list in the written statement really constituted a reserve which Government could draw upon to do engineering work on railways at a less expense than the permanent establishment. Although the Temporary Engineer recognised that his appointment was only a temporary one and liable to be terminated, yet experience showed that in the majority of cases he was kept on permanently, and the presumption therefore was that the position was a permanent one. The fact remained, however, that thirteen Temporary Engineers had been given notice without any reason at all, and this indicated that men were liable to be turned out at a month's notice.

(The witness withdrew.)

At Calcutta, Friday, 9th January, 1914.

PRESENT :

THE RIGHT HON. THE LORD ISLINGTON, G.C.M.G., D.S.O. (*Chairman*).

THE EARL OF RONALDSHAY, M.P.
SIR MURRAY HAMMICK, K.C.S.I., C.I.E.
SIR THEODORE MORISON, K.C.I.E.
SIR VALENTINE CHIROL.
MAHADEV BHASKAR CHAUBAL, Esq., C.S.I.
ABDUR RAHIM, Esq.
WALTER CULLEY MADGE, Esq., C.I.E.
FRANK GEORGE SLY, Esq., C.S.I.
HERBERT ALBERT LAURENS FISHER, Esq.

R. R. SCOTT, Esq. (*Joint Secretary*)

Major H. F. E. FREELAND, M.V.O., R.E. Deputy Traffic Manager, North Western Railway (representing Royal Engineers).

Written Statement relating to the Railway Department.

81,359. **(III.) Conditions of** service.—The number of Royal Engineer Officers at present serving in India and required to complete establishment in time of war is 377. Of this number **248** are employed either on the staff, in Sappers and Miners, in the Military Works Services or in miscellaneous appointments, leaving a balance of **124** to be employed on Civil Duties. **Of** these **124, 41** are employed in the Survey Department, 30 in the Public Works Department Roads, Buildings and Irrigation and *53 in Public Works Department Railways.* (The total strength is 5 short of establishment.)

(2) **As** a rule Royal Engineer Officers join Public Works Department Railways after they have completed $2\frac{1}{2}$ years and before completing **5** years total service. At the present moment the Officer whose name is first on the list of candidates has close on 5 years' service, and next to him stands an officer of just under **4** years' service, whereas the last Royal Engineer Officer to obtain an appointment had just under **4** years' service at the time.

(3) It may be taken therefore that the age of *a* Royal Engineer Officer on first joining the Department is about *23* years on the average and in the case of Kingston College men about 25 years.

(4) In Public Works Department Code Volume **I**, Chapter II, paragraph **143,** it is laid down that Subalterns Royal Engineers will on entering the Department count their departmental service as commencing $2\frac{1}{2}$ years after date of first commission unless they joined earlier and provided that no officer shall add more than one year to *his* actual service under this rule

This rule was modified by paragraph **2** of Government of India Resolutions, dated 11th February **1910** under which the first year of service of **a** Royal Engineer for the purpose of calculating pay, will be reckoned to commence $2\frac{1}{2}$ years from date of first commission

It should be explained that the majority of Royal Engineer Officers in Public Works Department Railways are employed in Engineering, and a few in Superior Revenue. The relative number in each is decided by the Railway Board in accordance with the requirements of the moment, it being recognized that it is desirable in the event of war that a certain proportion of Royal Engineer Officers should have a knowledge of Transportation and Traffic Administration.

81,360. **(IV.) Conditions of salary.**—(1) *Prior to* 1908 Royal Engineer Officers on joining the Public Works Department were given the option of two scales of pay, *viz.*:—

(*a*) Regimental pay plus Staff pay according to position in Department, and

(*b*) *Consolidated pay* which depended solely on departmental rank, *plus net military pay.*

Note.—Net military pay amounted to:—

	Per mensem. Rs.	a.	p.
Second Lieutenant	60	0	0
Lieutenant	70	0	0
Captain	140	0	0
Major	182	12	0
Lieut.-Colonel	243	8	0
Colonel	304	0	0

These amounts were paid in addition to the Civil Departmental pay "*for the time being,*" that is in addition to the pay drawn by Civil Engineers in the Department, and were considered as due to the Royal Engineer in view of the extra liabilities and expenses to which he was subject.

A young officer on arrival in India, or shortly afterwards, when he was offered an appointment in the Public Works Department Railways, had to work out for himself the relative advantages of the two scales of pay. He had not the knowledge sufficient to enable him to make his selection with any certainty that he was acting for the best, or the opportunity of seeking the advice of older men already in the Department; and as on paper the two scales were approximately equal in the aggregrate, the majority of young officers selected scale (*a*) which was slightly better in the junior grades, *i.e.*, up to about the 14th year of service.

As both these scales of pay were approximately equal, and as the payment of net military pay in the case of scale (*b*) was a practical admission on the part of the Government that a Royal Engineer Officer had liabilities and expenses which his Civil Engineer contemporary was not called upon to bear, it is contended that no circumstances have since arisen which can be considered as debarring the Royal Engineer Officer from the treatment which he received prior to 1908, whether he is an officer already in the Department who had elected for scale (*a*) or scale (*b*), or whether he had entered or will enter the Department subsequent to 1908.

(2) In the meantime the question of improving the pay of Administrative Officers in the Public Works Department was broached in Public Works Department Resolution No. 170, of 26th August 1905, and reasons were given for an immediate increase.

In spite of the fact that the extra expenses and liabilities of Royal Engineer Officers had always heretofore been recognised (see paragraph 1 above) a Standing Order No. 228 of Public Works Department Code, Vol. I (8th Edition) of 1907 reduced the pay of Royal Engineer Officers in the Administrative grades to a level of that of the Civil Engineers. The only officers to whom this new regulation could not be applied were those four who had on first appointment elected for the "Consolidated and net Military" scale. Thus officers on the "Staff" scale who had drawn somewhat less pay in the Executive grades and hoped for an improved salary in the Administrative grades now found themselves again at a disadvantage as compared with those who had selected the consolidated pay in the first instance.

In the case of two Colonels, Royal Engineers, both Chief Engineers and having precisely similar civil duties and responsibilities, one is drawing Rs. 304 a month more than the other, merely because he happened to make a fortunate selection of a scale of pay on entering the Department.

This anomaly exists both in the Engineering and Superior Revenue Establishments of State Railways.

It is contended that if good reasons existed for enhancing the pay of Civil Engineers in the Administrative grades of the Department, the same reasons must be applied to Royal Engineers also, *and* the latter are just as much entitled now as they always had been to consideration in view of the extra expenses and liabilities to which they are subject.

The only argument in support of the reduction of the Royal Engineer's pay to a level of that of his Civil Engineer contemporary in the Administrative grades apparently is, that, because the Civil pay is now high therefore the Royal Engineer should be happy to spend some of it in maintaining his military efficiency, subscribing to military funds, keeping up his uniform and equipment, paying enhanced rates of insurance and meeting many other expenses to which he, as a soldier, is liable!

(3) Following upon the revised regulations for the pay of officers in the Administrative grades, a Public Works Department Notification No. 675–694 E. of 24th April 1908 introduced an incremental scale for Civil Engineers in the Department whereby the salaries of those officers in the Executive and Assistant grades were raised by about 15 per cent. all round but the pay of Royal Engineers Officers remained unaltered.

It was, however, recognised that these orders involved an injustice to Royal Engineers already in the Department and in Public Works Department Notification No. 154–73 E. of 11th February 1910 an incremental scale was introduced for them also with back effect from April 1908.

This scale gave Royal Engineers an increase of about 7 per cent. as against a 16 per cent. rise in the case of Civil Engineers and whereas Royal Engineers had formerly received about 19 per cent. more pay than Civil Engineers this figure was reduced to 9 per cent. under the provisions of the revised scale.

(4) It was soon evident that these concessions to Royal Engineers already in the Department were only made to obviate discontent for in Public Works Department Notification No. 63–82 E. of 18th January 1911 the salary of a Royal Engineer entering the Department after 11th February 1910 was fixed at that allowed to a Civil Engineer in Notification No. 675–694 E. of 24th April 1908 above referred to.

The result is that Royal Engineers entering the Department after 11th February, 1910 will actually draw about 4 per cent. less pay than was laid down for their brother officers in paragraph 10 of Public Works Department Code, Vol. I, 1907, and a reduction of pay has been forced on a Service at the very time when salaries in practically every Department of Government have been augmented. Statement A sets forth the facts enumerated above.

(5) The arguments used to bring about this state of affairs have been purely financial; in other words, a large number of Royal Engineer Officers put their names down for employment in Public Works Department yearly and if the supply is greater than the demand, why should not the pay be reduced as an experiment, with the idea of ascertaining whether the supply will diminish in consequence?

In point of fact, the supply has not greatly diminished and the reasons are as follows:—

(*a*) If Royal Engineer Officers, to signify their disgust at the recent rulings, do not show willingness to come into the Department, the result will be that there will eventually be no senior Royal Engineer Officer in the Department to uphold the claims of the Corps, and there will be very little chance of their obtaining a hearing in matters affecting the treatment meted out to them in future.

It is believed that the opinion of no senior Royal Engineer in the Public Works Department was sought before the recent regulations were brought into force, owing, very probably, to there being no Public Works Department Royal Engineer holding a high appointment under Government at Headquarters or under the Railway Board at the time.

(*b*) If, on the other hand, Royal Engineers still continue to ask for appointments in Public Works Department Railways and there is no gap in the continuity of their service in that Department, it is probable that there will always be some Royal Engineer Officer of high rank holding an appointment at Headquarters or under the Railway Board whose opinion will carry weight should any question affecting the conditions of employment, service, pay, leave or pension arise.

For these and other good reasons there has been no great falling off in the number of Royal Engineers awaiting appointments in Public Works Department Railways.

(6) It must not be concluded, however, that because Royal Engineers look to the future and the possibilities of further legislation unfavourable to them, and endeavour to take such steps as seem calculated to offer the best chance of improving their conditions of service, they are not suffering from a sense of injustice.

They feel that Government has overlooked the grounds on which Royal Engineer Officers have hitherto been considered *as* entitled to, what may well be called, **a** retaining fee which Government pays them for its right to call upon them for a different class of duties in time of war.

(7) As a further instance of the claims of Royal Engineer Officers having been overlooked in recent years may be quoted the comparative salaries paid to them in Engineering and Superior Revenue.

Standing Order No. 46 for the Corps of Royal Engineers, issued in 1904 by the Adjutant-General in India, lays down that the pay and rank of those in the Superior Revenue shall correspond with those in Engineering.

Further, Public Works Department Code, Vol. IV. (1897 Edition), Chap. VIII., paragraph 39, details a scale of pay for officers, Royal Engineers in Superior Revenue, and in that paragraph states that the "Civil" portion of their pay shall "correspond to that of paragraph 35 of this chapter and to the former rates for the Civil and Military Members of the Engineering Establishment, as shown in Public Works Department Code, Vol. I., Chap. I., para. 10, Note *(a)*.

The attached Comparative Statement **B** shows that whereas the pay of Superintending Engineers, 2nd Class, was raised to Rs. 1,760 under the 1905 rules, and this class had heretofore always corresponded to Class I., Grade 2, in the Superior Revenue, the Revenue pay was only raised to 1,500 and Class I., Grade 2, practically abolished.

(8) The grounds on which Royal Engineer Officers claim to be entitled to Military, in addition to their Civil, pay are stated in their Memorial of April 30th 1913.

The expenses which they have to meet year by year in the matter of up-keep of uniform, saddlery, equipment, and military books, Corps subscriptions, *i.e.*, Mess, Band, Games, and Charitable Funds, all practically compulsory, and lastly, enhanced rates of insurance, will it is believed not amount to more than Rs. 100 per mensem on the average.

There remains, however, the very real liability of Royal Engineer Officers being transferred to Military duty in time of war, without notice and to any part of the globe, and in consideration of this liability they should at least receive similar treatment to the Special Reserve of Royal Engineer Officers in the Imperial Service.

It has been said that no great hardship is incurred by having to pass Military Examinations and undergo Military Courses; on the other hand, it is quite certain that a Royal Engineer Officer who fails to pass his examination for Military promotion will, no matter how efficient he may be in his Civil duties, be required to send in his papers and will not be permitted to retain even his Civil appointment.

Again, every continuous service Royal Engineer Officer in Public Works Department is required to undergo a year's course of Military instruction once during his service, partly at Chatham and partly in India, and while on this course draws Military pay and allowances only, and is not permitted to count the time as qualifying towards privilege leave.

In one case, which has been tested accurately, it is found that the actual loss in pay to the officer concerned, by reason of his being placed on this course, was £666, over and above anything he had to spend on obtaining English uniform and equipment required during the course.

81,361. (VI.) **Conditions of** pension.—The maximum pension which can be earned by Royal Engineer Officer in the Public Works Department is £700 per annum after **32** years completed service from date of first commission.

The normal pension of an officer of the Indian Medical Service—comparable with the Corps of Royal Engineers as a technical service—is £700 a year after 30 years' service, but in accordance with the provisions of Army Regulations, India, Vol. I., paragraph 726 and 728, the following increased pensions are admissible:—

	£
(i) Surgeon-General after **3** years' active service as such	1,050
(ii) Colonel after 5 years' active service as such	950
(iii) Colonel after **3** years' active service as such	**825**

Similarly, Civil Engineers who joined the Public Works Department not later than 1898 can qualify for *extra* pensions as follows:—£87 10s. per annum for 3 years' service as superintending Engineer and £87 10s. per annum for 3 years' service as Chief Engineer.

It is submitted that Officers, Royal Engineers, who rise to high appointments, under Government, carrying great responsibilities should be able to earn pensions commensurate with the pay they draw in those appointments, as is recognised in other Services to be right and proper.

STATEMENT A.

(*Vide* paragraph 81,360(4)).

Statement comparing an R.E. Officer's pay in P.W.D. Survey and Military Works Services, assuming that he has had at least 2½ years' service on entering P.W.D. and comparing for 20 years subsequently.

*Year of service in P. W. D. or M. W. S.	Total pay under old P. W. D. rules (Staff and Military) assuming military promotion at 3–11–20 years.	Total pay under old P. W. D. rules (consolidated and net military) assuming military promotion at 3–11–20 years.	Total pay under new P. W. D. rules for R. Es. in Dept., prior to 11–2–10 (*i.e.*, two yearly increments above Civil).	New Civil scale (proposed for R.E. new entrants).	Total pay of R. Es. in M. W. S. assuming military promotion at 3–11–20 years.	Total pay of R. E. Officers in the Survey Dept.
1st year	467	442	460	380	387	445
2nd "	495	442	500	420	441	495
3rd "	495	442	540	460	441	545
4th "	548	548	580	500	441	595
5th "	548	548	620	540	495	645
6th "	548	548	660	580	547	695
7th "	574	654	700	620	547	745
8th "	760	654	750	660	547	795
9th "	849	724	800	700	663	1,045
10th "	939	724	850	750	779	1,095
11th "	939	883	900	800	779	**1,145**
12th "	**939**	883	950	850	779	1,195
13th "	939	883	1,000	900	806	**1,215**
14th "	939	883	1,050	950	**832**	1,295
15th "	965	1,043	1,100	1,000	832	1,345
16th "	992	1,043	1,150	1,050	**832**	1,395
17th "	992	1,043	1,200	1,100	1.020	1,445
18th "	1,102	1,086–12	3,250	1,150	1,208	1,495
19th "	1,212	1,244–12	1,250	1,200	**1,208**	1,545
20th "	1,318	1,244–12	1,250	1,250	1.208	1.595
Averages	828	799	878	7PB	740	**1,040**

* To get length of Army Service add 2½ years to these figures.

Note.—(*a*) Average in column 4 exceeds column **2** by 6 per cent.

(*b*) Average in column 4 exceeds column 5 by 9 per cent.

(c) Average in column 5 exceeds column 6 by 6—2-3rd per cent.

(d) Average in column **7** exceeds column 5 by 23⅔ per cent.

(e) Average in column 2 exceeds column **5** by 4 per cent.

STATEMENT B.

(*Vide* paragraph 81,360(7)).

Comparative Statement of pay of R. E. Officers in Engineering and Superior Revenue.

Salaries per mensem in Rs.

REVENUE.					ENGINEERING.		
	1897 Rules.			1908 Rules.		697 Rules	1905 Rules.
Departmental Rank.	Consolidated scale.*	Military Officers on staff and Military scale.		Consolidated scale.	Departmental Rank.	Consolidated Pay.†	Consolidated Pay.‡
		Staff Salary.	Maximum in P.W.D.				
Class 1, Grade 1 ..	1,600	800	1,800	2,000	Superintending Engineer, 1st Cl.	1,600	2,000
„ I, „ 2 ...	1,350	750	1,575	Non-existent	„ „ 2nd „	1,350	1,750
„ I, „ 3 ...	1,100	700	1,350	1.500	„ „ 3rd „	1,100	1,500
„ II, „ 1 ...	950	600	1,350	1.100	Executive Engineer, 1st Gr.	950	1,060
„ II, „ 2 ...	800	500	900	1,000	, , 2nd „	800	850
„ II, „ 3 ...	700	400	800	900	3rd „	700	700
„ II, „ 4 ...	600	350	650	800	, 4th „	600	Non-existent
„ II, „ 5 ...	—	—	—	700	—	—	—
„ III, „ 1 ...	500	300	550	550	Assistant Engineer, 1st Gr.	500	550
„ III, „ ? ...	400	250	500	450	2nd „	400	450
„ III, „ 3 ...	350	200	450	400	, , 2nd (2)	350	350
„ III, „ 4 ...	250	—	—	300	—	—	—
(Under training)	—	—	—	Cl. III, Gr. 5,200/250			

* Corresponds exactly with the scale laid down in P. W. D. Code. Vol. IV, Chapter VIII, paragraph 35.

† Engineering pay under provision of P. W. D. Code, Vol. I, Chapter I, paragraph 10, Note (*a*).

‡ Engineering pay under provision of P. W. D. Code, Vol. I, Chapter I, paragraph 10, as corrected by Government of India Notification No. 228 of 1907.

Major H. F. E. FREELAND called and examined.

81,362. (*Chairman.*) There were 50 Royal Engineer officers in the Railway Department, although actually the Military List contained 53 names. Thirteen officers were in the Revenue Department, and thirty-seven in the Engineering Department.

81,363. A Royal Engineer officer had to remain at Chatham two years after he had obtained his commission. and this two years counted as service.

81,364. There was a rule that no Royal Engineer officer of more than five years' service could enter the Public Works Department railways. That rule was now strictly adhered to. If an officer had four years' service from the date of first commission, at the time he was given an appointment in the Public Works Department railways he would be credited with 1½ years. If, on the other hand, an officer came in with two years' service, he would not actually begin to count his Public Works service until he had completed 2½ years from date of first commission. He had no experience of such a case but subsequently recollected two cases.

83,365. If a Royal Engineer officer joined with 2½ years' service or less, he started at Rs. 380. If he joined with more than 2½ years' service, he started with the rate of pay which he would have received if he had entered the department 2½ years after the date of his commission. *e.g.*, if he joined with 3½ years' service, he would start, not at Rs. 380, but at Rs. 420.

81,366. With regard to the complaints made by Civil Engineers as to the manner in which they were superseded by Royal Engineers, he did not think it was possible to employ a Royal Engineer in the Public Works Department without giving him credit for his military service, or at least for a certain proportion of it. It was difficult for Royal Engineers to understand why the Civil Engineers should be dissatisfied with the position, when their age, and the age of their Royal Engineer contemporaries mere about the same. It was true that the Royal Engineer entered the department over the heads of certain officers on the civil side. and that this start affected his prospects during the whole course of his career, and to the same extent adversely affected the prospects of the Civilians whom he had superseded.

81,367. He did not think it would be fair to fix the pay of the Royal Engineer officer entering the Public Works or Railways, as though he had come in 2½ years after the date of first commission, and at the same time to place him at the bottom of the list for purposes of seniority. If such a system were adopted, Royal Engineers would have very much younger men over their heads giving them orders, and they would not have the opportunity of rising as quickly as their age entitled them to do.

81,368. It would be found that the age of the Civil Engineer on entering the departments was just under *23* years, whereas the age of the Royal Engineer officer 2½ years after the date of his first commission was *22* years 9¾ months on the average.

81,369. He could suggest no remedy for the grievances brought before the Commission by the Civil Engineers as he did not believe any real grievance existed.

81,370. Royal Engineer officers in the Public Works Department and Railway Department considered that instead of being allowed the ordinary civil scale of pay, they should receive the civil scale, *plus* the net military pay of their rank. The extent to which the orders issued by the Government in 1911 adversely affected Royal Engineers already in civil employ, was explained by statement A at the end of the written statement. Columns *2* and 3 stated the alternatives which Royal Engineer officers could have selected prior to the introduction of the new rules. The averages given at the bottom of columns 2 and *3* were Rs. 828, and Rs. 799, whereas Royal Engineer officers already in the Department now received an average through their first 20 years of service of Rs. 878 as stated in column 4. Therefore it could not he said that they had actually, in point of rupees, been adversely affected. It was by comparison with their Civil Engineer contemporaries that they were adversely affected. He would not admit that any undertaking given to officers at the time of their transfers to the Public Works Department by Government had not been violated because in former days, when a Royal Engineer officer came to India, and was given the opportunity to select one of two scales of pay, he had to take what he had offered *to* him; and of the two scales there was very little difference up to the end of 20 years' service. Afterwards there was a considerable difference in favour of the consolidated scale, which was the civil departmental pay for the time being *plus* net military pay. Royal Engineer officers said that when the Civil Engineer pay had been so greatly increased, those who had selected the alternative system should have had an opportunity of choosing again.

81,371. The new rules as to pay had not adversely affected recruitment on the part of Royal Engineers, and he gave his reasons for this in his written statement. He spoke from personal experience. Several young officers had written to him personally, asking him what they should do under those distressing circumstances. He quite recognized that the explanation he gave in his written statement presumed the existence in the Royal Engineer officers of a spirit of extraordinary self-sacrifice but there were other reasons. First of all, many young Royal Engineer officers made up their minds to go into the Public Works Department on the advice of their friends and relatives in England, who very probably had been in the service in India a good many years ago, when things were very different. Further, it could not be gainsaid that service in the Public Works Department offered a greater scope for a keen officer, and certainly gave more power of initiative to a young officer, and it was generally considered that there were higher careers open to men who were in the Public Works Department. Royal Engineers were assured that if they went into the Public Works Department it would not affect their selection for active service, and that was the assurance they required.

51,372. He saw no financial reason why Government should pay Royal Engineers a higher rate than their civil colleagues, but he did see very strong grounds for paying them more on the ground that they did precisely the same work, and were subjected to expenses which their Civil Engineer contemporaries did not incur. The fact that Royal Engineer officers obtained certain special privileges over Civil Engineers in regard to leave and pension should certainly be taken into account.

81,373. (*Mr. Abdur Rahim.*) He had had no opportunity of observing the work of the old Indian Engineers who came out from Rnrki, as compared with the work of the present men. He was aware that there was considerable feeling among officers of the Provincial Service with regard to their status.

81,374. (*Mr. Madge.*) Once a Royal Engineer's position was assigned to him on entering the Department, there was no further cause of grievance on the part of Civil Engineers. Promotions went by seniority.

81,375. (*Mr. Fisher.*) The special expenses to which Royal Engineers were subjected to, were of a military character, and were incidental to their positions as officers. He was quite of the opinion that the compensation for those charges should be paid by the Military Department and *not* by the Civil *administration* of India.

81,376. (*Mr. Sly.*) He was not sure whether the present rule, that no Royal Engineer of more than five years' service was allowed to enter the **Railway** Department, also applied to all branches of the Public Works Department.

With regard to the evidence of a representative of the Royal Engineers given at Delhi* to the effect that there was no rule governing the question of seniority, the witness referred to Appendix H, paragraph 2 of the written statement, submitted by Royal Engineer officers. It was true that the first sentence of that appendix indicated that the rule was limited to pay, but by determining an officer's pay, his seniority was also automatically determined. That was his own opinion, he could not quote any rule for it.

81,377. He presumed it was the case that if a Royal Engineer officer entered civil employ after only two years' service, he did not count his civil employ for the first six months. He could give no instances, because he knew of no Royal Engineer officers who had come out from Chatham with less than two and a half years' service. He subsequently recollected two cases, one occurring over 20 years ago and one within the last five years.

81,378. The consolidated scale, which would now be the advantageous one, was only selected by four officers out of 50. Therefore the grievance stated was common to all the Royal Engineers in the service except four. It was not common to officers who were admitted since 1910, as they came, in with their eyes open; they could not claim that Government had broken faith with them, but they had a great grievance in that a *reduction* of pay was being forced on them at the very time when salaries in all other services were being raised.

81,379. (*Sir Theodore Morison.*) It followed from the rule in regard to the railway service—that a man could not enter it if he had more than five years' military service—that a Royal Engineer could not gain more than 2½ years. Nobody could be brought in over the head of a Civil Engineer with longer service than 2½ years to his credit.

81,380. When he said at the top of page *2* of the written statement, that the majority of young officers had selected scale (A), which was slightly better in the junior grade, by the junior grade he meant to say up to about 14 years of service. After 14 years of service, column 3 began to get better than column 2, and, after the 20th year of service, an officer might expect to be in the administrative grades, which were not detailed in statement A, and in most cases the consolidated and net military scale was generally considered better in the administrative grades.

81,381. (*Lord Ronaldshay.*) If a Royal Engineer was not allowed to count his military service *minus* 2½ years as service in the Public Works Department, the result would be that he would be serving when he joined the Public Works Department, under Civilians who were younger than himself, so that really the only object of the rule was to put a Royal Engineer in a position of equality of age with the Civilian.

31,382. (*Chairman.*) There would be no serious objection from a military point of view to officers taking up civil employment direct from Chatham. He thought for all practical purposes they would have had sufficient military training during their time at Woolwich and at Chatham.

(The witness withdrew.)

B. STAPLETON, ESQ., F.C.H., M.INST.C.E., Officiating Superintending Engineer, Eastern Bengal State Railway (representing Imperial Engineers).

Written Statement relating to the Railway Department.

81,383. **(I.) Methods of recruitment.**—I agree with paragraph 1 of the Written Statement of the Civil Engineers' Association,* that it would be advantageous if a residential college, on the lines of the late Royal Indian Engineering College, Cooper's Hill, were established. I consider that the establishment of such a college would become *a* practicable proposition if it were arranged to make it the main recruiting centre for all Departments of State Railways, as well as for Telegraphs. In the event of its establishment, it would provide the only satisfactory entrance into the Department for Indians wishing to serve on Railways

So long, however, as recruitment by selection is maintained I consider that at least 50 per cent. of the members forming the Selection Committee should be senior officers of the Public Works and Railway Departments, either on the active or retired lists, as it is felt that the intimate knowledge of these Departments and their requirements possessed by such officers, would be of much value in assisting the Committee in their selection of the right class of man. I do not consider it advisable to make any appointments in India to the Imperial Service, and I think that no

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* *Vide* evidence relating to the Public Works Department, Volume XVI, paragraph 72,155.

* *Vide* evidence relating *to* the Public Works Department, Volume XVI, paragraph 71,648.

Indian should be appointed unless he has spent at least four years in England.

81,384. (II.) System of training and probation.—Every recruit should have at least a year's practical training in the British Isles, before coming to India, in addition to an adequate theoretical training.

I am strongly in favour of a probationary period in India. Care should be exercised in placing recruits under suitable officers and on suitable work, and if well reported on after one year's service they should be confirmed. If not well reported on there should be another year's probation under a selected officer and if the report is again unfavourable the services of that recruit should be dispensed with; but if the second report is favourable then a third year's probation may be insisted on, if considered advisable.

81,386. (III.) Conditions of service.—I agree with the Civil Engineers' Association that the cadre of the Permanent Engineers should be more frequently revised than has been the case in the past. It is advisable that the number of permanent Engineers should more closely accord with the number of permanent appointments, and that less reliance be placed upon making up deficiencies by the employment of Temporary Engineers.

With regard to the employment of Temporary Engineers which is acknowledged to be unsatisfactory, I consider that there would be no disadvantage to the State in over-recruitment of permanent Engineers, provided that such over-recruitment is counteracted by elimination of unsuitable men after probation and provided there is proper selection for promotion to the Executive Engineer grade. In this connection it appears to me that Railways constructed by private enterprise nnder agreement with Government should be built by State Railway Engineers, if these Railways are to be subsequently worked by the State on a fixed proportion of working expenses to earnings. Future appointments of Temporary Engineers should only be made on the specific understanding that the holders of the same will not under any circumstances be brought on to the permanent scale. It remains with Government, if it is considered expedient, to improve the Temporary Service as such. Thus the improved provident fund for temporary employés on State Railways might be extended to all Temporary Engineers in the Public Works Department.

The conditions under which Royal Engineers are drafted into tha Railway Department have affected adversely the position and prospects of a large number of Civil Engineers. Royal Engineers brought in are usually credited with extra departmental service to such an extent as to give them departmental seniority over Civil Engineers who are senior to them in age, and of many years standing in the Departments. This is unfair to a Civil Engineer thus superseded; if senior, his promotion to administrative rank is retarded; if junior, it may result in delaying him frnm being placed in a Divisional charge. It is recognised that it is necessary in the interests of Government, that employment should be found for Royal Engineers in the Department, but it is strongly urged that the appointments should be made in such a manner as not to impair the prospects of Civil Engineers of the same age already serving in the Department.

Article 649 of the Civil Service Regulations which provides for the compulsory retirement of Civil Engineers, who on attaining the age of fifty years have not been promoted to the rank of Superintending Engineer, should, I think, be more rigidly enforced in the case of officers, who on'reaching that age are reported as not qualified for promotion to the rank of Superintending Engineer; but it should not he made an absolute rule; a man, thongh not suitable for a Superintending Engineer, may in some cases still be a good Executive Engineer.

In paragraph 80, Volume 1 of the Public Works Department Code the principle is laid down, that promotion to the Administrative Ranks should be by a system of selection as opposed to that of mere seniority. It is recommended that this principle be more closely followed than at present. I think that it would also be advantageous to promote Assistant. Engineers to Executive rank by selection more generally than is done at present.

Great. dissatisfaction has been caused by certain extensions of service having been granted in recent years beyond the age of 55, in distinct contravention of Art. 650 C. S. R. which reads "All Civil Engineers . . . . are required to retire on attaining the age of 55 years." I admit that it may, in exceptional cases, bc advisable to retain the services of an officer after the age of 55 to complete some particular work; such cases will be very rare, and in every such case the officer should be required to retire under the rule, and should be appointed a Temporary or Special Engineer for the period his services are retained. This was the procedure adopted when the services of Mr. F. T. G. Walton, C.I.E., were retained for completing the Godavari bridge. An extension of service to an Engineer, without putting him outside the cadre, must of necessity stop the promotion of other men, and may also affect their pensions by preventing them from putting in a full 3 years as Chief Engineer or as Superintending Engineer.

81,386. (IV.) Conditions of salary.—In connection with the question of starting salary I would remark that at the time of the founding of Cooper's Hill in 1871 it was held by the then Secretary of State that £420 per annum was a suitable starting salary for attracting the best Engineers to India; owing to the depreciation of the rupee this has never been worked to since the first year or two; and although improvements made in the scale of pay five years ago have been some conipensation for the increased cost of living, I do not think that anything has occurred since 1871 to justify a lower starting pay than was then considered to be essential. This is borne out by evidence given before the Committees of enquiry into the affairs of Cooper's Hill College in which it was admitted that the earlier men: *i.e.*, the men who entered the Department with the better prospects, were superior on the average to those of' subsequent years.

In consequence of the continnous rise in the cost of living the scale of pay should be reconsidered at fairly freqncnt intervals, say every ten years. A local allowance should be given to officers stationed in Calcutta; this was given until a few years ago, *vide* Appendix 19 to Public Works Department Code, Volnrne III; but since the Calcutta House Allowance Scheme was introduced in 1906, no allowance is admissible except to a married officer who has his wife or family residing with him. I believe the same rules apply in Bombay.

The salaries drawn by Engineers-in-Chief and senior Engineers generally are inadequate and compare unfavourably with those in other countries. Although it is the practice that the post of Engineer-in-Chief of the North-Western Railway carries with it the rank of a Chief Engineer, there is no scale of pay laid down for the Engineers-in-Chief of the Eastern Bengal and the Oudh and Rohilkhund Railways or for Senior Government Inspectors; they draw the pay of their rank. I recommend that the *minimum* pay of each of these posts should he Rs. 2,000 per month.

81,357. (V.) Conditions of leave.—*Privilege Leave*.—(i). Under the present rules an officer can earn privilege leave to the extent of one calendar month for every eleven complete calendar months of duty, and such leave is cumulative up to a period of three months only. In the case of officers who have accumulated the full period it frequently happens that the exigencies of the public service prevent their being granted privilege leave when they desire it, and this leads to the leave lapsing through no fault of their own. It would in a measure mitigate against this loss of leave on full pay which an officer has fairly earned, if the cumulative period were extended from three to six months.

(ii) An officer should be allowed to avail himself of all privilege leave due to him immediately prior to retirement, and be permitted to retire from the service. at the end nf his leave, without having to return to duty as he is now obliged to do. This concession has already been made where privilege leave is combined with other leave, and its extension to privilege leave alone, besides removing a legitimate grievance among officers of the Departments, would lead to much less administrative inconvenience than is now the case.

Special Leave.—Under Art. 318, C. S. R., an officer is entitled to leave allowance for the first 6 months for which he is on special leave, thereafter he is entitled to no leave allowance. I consider that leava allowance should be given for the whole period on which an officer is on special leave, or as an alternative that the proviso in Art. 316, that an officer who has had special leave must render six years' actual service before he can again have such leave, be omitted.

Furlough.—(i). I agree with the Civil Engineers' Association Memorandum on this subject; but I recommend that Art. 308, C. S. R., should be amended *so* as to allow an officer to take furlough up to a maximum of one year, after 6 years' service; at present he can take no furlough until after 8 years' service. I also recomniend that the period of **3** years' "continuousservice required after return from furlough before an officer can again take furlough should be reduced to 18 months.

(ii). The furlough allowances for Civil Engineers should be the same as those for Military Engineers subject to Civil leave rules; the roles for the granting of furlough are the same, but while a Military Officer is given *a* leave allowance subject to a minimum of £500 *a* year, or the salary last drawn by him on duty, whichever is less and a maximum of $1,000 **a** year, **for** a Civil Engineer there is no minimum and the maximum is £800 a year (Art. 314, C. S. **R.).** Under these rules the maximum furlough pay which can be drawn by a Civil Engineer is as follows:—

Years of completed service.	Maximum furlough pay.
	£
8	**279**
9	297
10	316$\frac{1}{2}$
11	337$\frac{1}{2}$
12	360
13	382$\frac{1}{2}$
14	405
15	427$\frac{1}{2}$
16	450
17	472$\frac{1}{2}$
18	495
19	517$\frac{1}{2}$
20	540
21	555
22	562$\frac{1}{2}$
3 years as Superintending Engineer, 3rd class ...	***675***
3 years as Superintending Engineer, 2nd class ...	787$\frac{1}{2}$
Thereafter	800

Thus a R. E. Officer going on his first furlough after 8 years' service draws nearly double the allowance *a* Civil Engineer draws, and actually draws more than a Civil Engineer of 18 pears' service.

81,388. **(VI.) Conditions of** pension.—I fully endorse what is represented under this head in the Civil Engineers' Association Written Statement. The inadequacy of the pensions granted under the present rules is the principal grievance of all Civil Engineers, both in the Public Works Department and the Railway Department; memorials have over and over again been sent to Viceroys and Secretaries of State on the subject. In Augnst, 1912, the Government of India informed tlie officers of the Public Works Department that the matter could not be further ronsidered until the report of the Royal Commission on the Pnblic Services in India was received.

Invalid Pensions.—Prior to 1884, invalid pensions granted to Civil Engineer officers of the Public Works Department on the Imperial List were governed by Art. 474, C. S. **R.**; this Article also governed the pensions of all officers belonging to the Uncovenanted Services as then termed. In Lord Kimberley's Despatch of 1883, a new scale was introduced for Imperial Engineers and Telegraph Officers with a view to ameliorating their conditions of service; this scale is covered by Art. 641, C. S. R. Under this Article the scale has been increaser! from $\frac{10}{60}$ths of average salary for 10 years' completed service, $\frac{11}{60}$ths for 11 years and so on, to $\frac{20}{60}$ths for 10 years, $\frac{21}{60}$ths for 11 years and so on, but at the same time the maxima limits have been reduced from those allowed by Article 474. How this rule, brought in with the object of improving conditions in certain Services, adversely affects officers at the present time, and how much better off an invalided Engineer would have been under Article 474, is clearly shown from a comparison of the columns in the table below:—

Years of completed	Civil Service Regulations Article 641.			Civil Service Regulations Article 474.		
	percentage basis.		mum.	percentage basis.		mum.
		Rs.	Rs.		Rs.	Rs.
10	$\frac{20}{60}$	2,813	1,000	$\frac{10}{60}$	1,406	2,000
11	$\frac{21}{60}$	3,150	1,400	$\frac{11}{60}$	1,660	2,200
12	$\frac{22}{60}$	3,520	1,800	$\frac{12}{60}$	1,920	2,400
13	$\frac{23}{60}$	3,910	2,000	$\frac{13}{60}$	2,210	2,600
14	$\frac{24}{60}$	4,320	2,600	$\frac{14}{60}$	2,520	2,800
15	$\frac{25}{60}$	4,760	3.000	$\frac{15}{60}$	2,850	3,000
16	$\frac{26}{60}$	5,200	3,000	$\frac{16}{60}$	3,200	3,200
17	$\frac{27}{60}$	5,670	3,000	$\frac{17}{60}$	3,570	3,400
18	$\frac{28}{60}$	6,160	3,000	$\frac{18}{60}$	3,960	3,600
19	$\frac{29}{60}$	6,670	3,000	$\frac{19}{60}$	4,370	3,800
20	$\frac{30}{60}$	7,200	4,000	$\frac{20}{60}$	4,800	4,000

It is a decided anomaly that officers of other services coming under Art. 474, C. S **R.,** should, if invalided, be entitled to **a** higher pension after 10, 11, 12, 13, 16, 17, 18 and 19 years' completed service, and to *a* less pension after 14 or 15 years' service.

It is urged, therefore, that to make Art. 641 of real benefit to Civil Engineers now serving in the Department, the maxima limits should be at least the same as those fixed according to Art. 474.

Retiring Pensions.—Under existing rules after a service of not less than 20 years a retiring pension is admissible as follows:—After 20 years to 24 years of completed service, a maximum pension of Rs. 4,000 a year; after 25 years of service and above, Rs. 5,000 a year; for officers appointed not later than 1898, additional pensions of Rs. 2,000 or Rs. 1,000 may be granted under certain circumstances, detailed in Art. 642, C. S. R.; officers appointed since 1898 are only entitled under certain circumstances to an additional pension of Rs. 1,000 a year, ***see*** Art. **643,** C. S. **R.** These pensions are payable in England at the rate of 1*s.* 9*d.* to the rupee; converted into English money, the pensions which can now be drawn are, therefore—

(*a*) For men appointed not later than 1898:—

	£
After 20 to 24 years' service ...	350
After 25 years' service	437$\frac{1}{2}$
Additional pension	87$\frac{1}{2}$ or $2175
Absolute maximum	612$\frac{1}{2}$

(b) For men appointed after 1898:—

After 20 to 24 years' service ...	350
After 25 years' service	437$\frac{1}{2}$
Additional pension	87$\frac{1}{2}$
Absolute maximum	525

For men appointed in 1910, or later, the additional pension is snbject to the further condition that they must, in the event of voluntary retirement, have completed 28 years of qualifying service.

The scale of pension given in Art. 641, C. S. **R.,** varying from $\frac{20}{60}$ths of average emolnments for an invalid pension after 10 years' service to $\frac{30}{60}$ths for *a* retiring pension after 20 years' service and above **is** inoperative and meaningless, with the maxima now fixed; considering that an officer is appointed on Rs. 380 a month, and will ordinarily be drawing Rs. 800 a month after 10 years' service, it is absurd to rule that he may then get an invalid pension of one-third of his pay, snbject to a maximum of Rs. 83$\frac{1}{3}$ a month, which is considerably less than one-third of the pay he drew in his first year of service; it is equally absurd to rule that he may retire after 20 years' service on half-pay, subject to a maximum which is equivalent to half the pay he was drawing in the eighth year of his service. There is no doubt that this scale of pension mas framed with the intention that pensions which are really deferred pay should bear a definite proportion to salary; but while improvements have been made from time *to* time in the salaries, the pensions are now actually less than they mere in 1864, when the ordinary pension of Rs. 5,000 a year was worth considerably more than £500. **It** will not be disputed that the cost of living in England has increased enormously, and is still increasing; the cost of living in India has also increased, so that in spite of the improved pay it is impossible for a man to save money if he has *a* family to bring up, and it is impossible for him to live in any degree of comfort on his pension.

The retiring pensions that we ask for are as follows: —

	£
After 20 years' service	350
,, 21 ,, ,, ...	380
,, 22 ,, ,, ...	410
,, 23 ,, ,, ...	440
,, 24 ,, ,, ...	470
,, 25 ,, ,, ...	500
,, 26 ,, ,, ...	540
,, 27 ,, ,, ...	680
,, 28 ,, ,, ...	620
,, 29 ,, ,, ...	660
,, 30 ,, ,, ...	700

Additional pension £40 a year for each year in an administrative grade, subject to a maximum total pension of £940 a year.

Family Pension Fund.—The question of a Family Pension Fund, I consider, to be of great importance to the Service. A scheme has been worked out, the rough idea of which has been explained to me, under which it is proposed that an officer should decide within a year of his marriage whether he elects to receive whole of his pension in his own name as if he were a bachelor, or to divide it equally with his wife, the half payable to his wife being paid to her during her lifetime from the date of the officer's retirement, or death, if earlier. The scheme is understood to have been drawn up on *a* strictly actuarial basis so as not to cost Government any more than the ordinary pension. This concession, which would cost Government nothing, would be considered a very valuable one.

81,389. **(VII.)** Such limitations as may exist in the employment of non-Europeans and the working of the existing division of services into Imperial and Provincial.—The number of Indians employed as Engineers on Railways should at present be very small indeed; it is very exceptional to find an Indian who is fit to occupy an administrative post as an Engineer; in fact, I can only quote one case of an Indian officer who has been so qualified. As Assistant Engineers on Railways Indians sometimes do very well, as Executive Engineers they are rarely a success, and it is hardly ever possible to promote them to Superintending Engineers. On Railways worked by Companies it is very exceptional to employ an Indian as an Engineer, *e.g.*, on the B. & N.-W. Railway there is not a single one out of a total of 35; on the B.-N. Railway only one out of 60; on the B., B. & C. I. Railway three out of 58; on the E. I. Railway one out of 45; on the G. I. P. Railway four out of 91; these being all Assistants only. and some of them temporary. Native States almost invariably appoint *a* European to supervise their railways; at the present time European officers are in charge of railway work in Gwalior, Mysore, Hyderabad, Bhavnagar, Gondal, Jodhpur, Bikaner, Jaipur, Udaipur, Patiala, Jamnagar, Barode, Morvi is, I believe, the only Native State employing an Indian as Manager of its railways.

The Provincial Service is composed of Indians, Anglo-Indians and Europeans educated in this country, and usually of a less liberal education than the Imperial Engineers; Provincial Engineers on State Railways will only in very rare cases ever be promoted to Superintending Engineers; the class of man is not, as a rule, fit for an administrative post on a railway; very few of them are even fit to be put in charge of a division on a railway. Openings must be found for this class, and the Provincial Service is quite suitable, but I do not consider that they should be employed on Railways; there is plenty of Engineering work in this country on roads, district boards, &c., for which these men are qualified; it is a mistake, and generally a costly mistake, to employ them on Railways.

81,390. (VIXI.) Relations of the service with the Indian Civil Service and other services.—At the time of the establishment of the Royal Indian Engineering College, Cooper's *Hill*, the Secretary of State announced in Parliament that he was inaugurating a great service on a par with the great Civil and Military Services. I consider that this object can never be fully attained until Railways are represented both on the Viceroy's and on the Secretary of State's Executive Councils.

81,391. **(IX.)** Any other points within the terms of reference to the Royal Commission not covered by the preceding heads.—Imperial Engineers now in the service come under different rules for furlough and pension according to whether they were appointed in England or in India. There are only 12 Imperial Engineers still in the Railway Department who were appointed in India; of these 9 are Europeans and 3 are Indians. Considering that Indians now appointed to the Imperial Service come under the same rules as Europeans appointed in England, it would be equitable to bring these 12 Engineers under these rules also.

The existing Travelling Allowance rules are very inadequate in case of transfer; under Arts. 1094 and 1012. C. S. R., an officer on transfer is entitled to double 1st class fare; this is usually not nearly sufficient to cover actual out-of-pocket expenses. If an officer is transferred in the interests of the service, I consider that he should be enabled to move without actual loss.

On Railways under construction, a consolidated travelling allowance is granted by all Companies' lines to cover the expense of keeping horses, &c. I consider that the same concession should be given to Engineers on State Railway Construction; the allowances granted under the present rules are often inadequate to cover the actual expenses which have to be incurred.

Mr B. Stapleton called and examined

81,392. (*Chairman.*) Witness represented 47 Imperial Engineers recruited in England in connection with the Eastern Bengal State Railway, and other Railways in Calcutta He was at present Engineer-in-Chief for Construction on the Eastern Bengal Railway The views he gave in the written statement generally represented those of his colleagues.

81,393 He agreed with paragraph 1 of written statement of the Civil Engineers Association, to the effect that it would be advantageous to establish a central residential college on the lines of Cooper's Hill. He would admit that having regard to the many institutions now established in England, the establishment of such a college was rather unlikely, but he thought it would be a very good thing to get men for the Traffic Department. for the Telegraph Department. and for the Public Works Department through a Central College, and with so large a number of men it would be quite possible to establish a college. The advantage in having all those men from one central college would be very great indeed. He admitted that the professional training afforded by some of the colleges now existing in England was certainly as good as that which had been obtained at Cooper's Hill.

81,394. No Indian should be appointed to the Department unless he had spent at least four years in England. The advantage of an English training for Indians was exceedingly great; they saw the work done there, their character was greatly improved. and it made them much better fitted for controlling a mixed staff of Europeans and Indians. The Indians he **had** come across who had been at Cooper's Hill were distinctly better than the Indians who had not been to Cooper's Hill. Rurki in the past had turned out some engineers of distinction but the average was not anything like as high as that of the men who came from England. He apprehended no difficulty in giving Indians a four years' training in England.

81,395. He thought the existing Indian colleges might recruit for the Roads and Buildings Department, or other departments which were not so important as the Railway Department.

81,396. As regards the training for the higher posts, he would insist on Indians going to England, and he thought if Imperial Engineers were appointed again from Rurki, they should go to England for two years after leaving, and do practical work there, either with a railway company, or with a firm of contractors. He did not think the works which were now being carried out in India gave a sufficient opportunity for the training of young recruits. It was not only the work that had to be taken into account but the way in which it was done, and the whole atmosphere. The work in India was very inferior to what it was in England, especially in the lower grades. An English navvy was infinitely superior to an Indian coolie. The actual work completed was not inferior to the work completed in India; he did not say the result was less satisfactory, but it cost more. It would cost less if it were done more efficiently; and the cost was a very important part of the result.

81,397. Provincial Engineers on State Railways only in very rare cases would be promoted to be Superintending Engineers, and few were fit for the charge of a division. No Provincial Engineer had seen long enough service to become a Superintending Engineer. He could not mention any cases of Provincial Engineers who had not been promoted to executive rank when they reached the top of the list of assistants. He had no figures to show that any Provincial Engineer had actually been passed over for the charge of a division.

81,398. He was strongly in favour of the introduction of *a* probationary period, with the present system of recruitment. Personally he did not think it would have any adverse effect on recruitment. He had heard men who had come to India in recent years from England say that it would have an adverse effect, but he himself did not believe it. He suggested that the probationary period should be one year. If a man was badly reported on at the end of that year he should have a further year's trial if he so desired, and then if he was again badly reported on, he should not be admitted to the service.

81,399. He thought some of the Temporary Engineers were sufficiently good men to be appointed on a permanent basis, but it was a very difficult matter to bring them on to the permanent pensionable cadre without causing hardship to men already in the service. He therefore thought they ought to be put on a special list of their own. There used to be a list of special Engineers some years ago, who were non-pensionable Engineers, and he would start a similar list for Temporary Engineers. It was true that some of the posts which Temporary Engineers now held were permanent in their character; in fact they were included in the permanent cadre. How it came about that they were filled by Temporary Engineers who had not the same conditions as permanent officers, was that the permanent men were on what might be called temporary work. For instance, on the Lower Ganges Bridge there were now 13 permanent engineers. This meant that 13 posts which he called permanent cadre posts on open line were being filled by Temporary Engineers.

81,400. This state of things was due to the fact that the temporary officer was not regarded as sufficiently efficient to undertake the responsible constructional work. If there were no Ganges Bridge being built those 13 posts in the temporary cadre would not be necessary, unless some other constructional work was started.

81,401. If a special cadre for Temporary Engineers were created, the majority of posts in it would be of a sub-divisional character but there would also be a number of executive posts. It was true that the prizes in the cadre would be very few, and that the large majority of officers who went into it would have to be contented for all their time with sub-divisional charges. He thought, however, that on the whole that would be the best solution of a difficult problem. He did not think Temporary Engineers could expect to get promoted to the highest posts. They should be given the advantages of a Provident Fund.

81,402. He recommended that a year's furlough should be allowed after six years' service instead of eight. He thought the latter period was too long. What happened at present was that an officer after three or four years' service took combined leave of three months' privilege leave, and three months' special leave on urgent private affairs. He did not think that was the proper way to take leave, on urgent private affairs. It would be better to allow an officer to take furlough. and call it furlough. Officers were undoubtedly deterred from taking furlough by the consideration that the furlough allowances were insufficient.

61,403 He did not think study leave was required, but specially selected officers should be put on deputation abroad for special work much more freely than they were at present. Two or three officers had gone to America to study the traffic working on American Railways, and one officer had gone to Australia to study the question of the timber supply for sleepers, and to report. He did not know what the allowances of such officers were. It should be left to the authorities to decide to whom they should grant the deputation. He made the suggestion because he felt that there would be no dangers under such a system of any waste of time, but that an officer would employ his time for the definite purpose for which he had gone abroad.

81,404. With reference to the statement in the written statement that a scheme for a Family Pension Fund had been worked out he had further discussed the matter, since the written statement was printed, and he had come to the conclusion that the proposed scheme was not a very good one. It would be much better to have something on the lines of the Indian Military Services Family Pension Fund, to which officers should all subscribe. He would be satisfied if a scheme were devised, which would be managed by Government, and to which officers would have to contribute, provided the personal pensions were improved. If the pensions were substantially improved officers would be prepared to pay for the whole of the Family Pension Fund without any further contribution from Government: otherwise he thought Government should assist the Family Pension Fund.

81,405. *(Lord Ronaldshay.)* The grievance which the Service felt as to the introduction of Royal Engineer officers was not anything like so great as it used to be, but he was still not satisfied. Royal Engineer officers should be appointed to the Railway Department on exactly the same terms as Civil Engineers; that was to say, they should be appointed between the ages of 21¼ and 24¼, and they should come in at the bottom of the list with their Civil Engineer contemporaries. He did not see any reason for bringing in *a* Royal Engineer officer at a higher rate of salary, and giving him extra service. If a Royal Engineer was appointed between the ages he had just suggested, it would not be cutting down his service in the Army to a negligible quantity. He did not agree it was desirable that a Royal Engineer should have a certain amount of service in the Army before entering civil employ, in view of the fact that he was primarily a military officer. A Royal Engineer should go through his Chatham course, which would bring him to about the same age as a Civil Engineer. What happened at present was that after he left Chatham he came to India, and went into the Military Works Service. There was no more military work in the Military Works Service than there was in the Railways. He could not say whether the five year rule applied only to the introduction of Royal Engineers to the Railway Service, or whether it applied to the Public Works Department also.

81,406. *(Sir Theodore Morison.)* He believed engineers were usually appointed on Companies' railways on a short term of agreement of about three years, after which they could give, or be given, six months' notice. He did not think it would be advisable for Government to recruit on the same lines, as such a system would not attract good enough men. The fact that Government service was permanent was one reason why the State Railways obtained better men than the Companies. The pay was practically the same. The class of men who for a few years came out under covenant was a very good class indeed, but they were extremely dissatisfied with their terms, and he did not think if the covenant system was again started, the same class of good men would be obtained.

81,407. With regard to the separate cadre which he suggested for Temporary Engineers, his idea was to create a certain number of new superior posts which would be permanent. More Executive Engineer posts were required on the Eastern Bengal Railway at the present time. His reason for not recommending merely an increase of the permanent cadre, but recommending **a** sort of inferior service was because he thought a man who had been through Coopers Hill, and had been appointed in the regular way, deserved better terms than those men who had come in casually, even though they had proved themselves good men. Such men should not be brought on to the Imperial list; it would be treating them too well.

81,408. He quite saw the point that when the suggested new organisation for ‘Temporary Engineers was created, the same clifficulties would again arise on account of the constant contraction and expansion of work, for which Temporary Engineers would have again to be taken on, and that there would then have to be another set of Temporary Engineers for which another cadre would have to be instituted. The best way to get over that difficulty was to increase the recruitment of permanent men, and to increase the permanent cadre. It need not necessarily follow that there must come a time, with the contraction of the work, when there would be a good number more men than it was economical for the State to employ, as a great many of those men could be employed on the construction of guaranteed railways. He admitted that the expansion and contraction of railway work affected all kinds of railways, whether under Government or nnder Companies, and that when, for financial reasons, there was a contraction of railway construction, it affected the Companies quite as much as the Government of India, and that therefore when the Government had men to spare, that would be the very time when the Companies would not be able to take them.

81,409. (*Mr. Chaubal.*) The **work** done by an Assistant Engineer on Railways qualified him for performing the duties of an Executive Engineer. There was a considerable difference in the nature of the work done by an Assistant Engineer and an Executive Engineer. The Assistant Engineer personally looked after the work and measured it up. The Executive Engineer had the control of perhaps three Assistants. He did more designing work, and exercised general superintendence, but he did not go out himself to measure up the contractor’s work. He had two Indian Executive Engineers under him, and he thought from those two instances he was justified in saying that an India Engineer who might be qualified to do the work of an Assistant Engineer would very rarely be competent enough for an Executive Engineer’s work. He drew that conclusion, also, after having seen the work of **a** great many more Jndians. He did consider the argument that railways worked **by** Companies did not employ Indians in the administrative posts, was one which justified his opinion that Indians would not do as hxecutive Engineers on Railways. The appointment of **a** Chief Engineer or of an Executive Engineer on railways worked by Companies rested with the Boards of the Companies on the recommendation of the Chief Engineer. One reason why Indians were not suited for work on Railways was because there was an age-limit of **55,** and an Indian got old very much sooner than a European. If the age-limit was **40,** or even **45,** there would be some most excellent Indians in the Service, but the difficulty arose after they reached that age. A European mas at his best when he was 50. and an Indian was at his best at about **40,** after which he deteriorated rapidly. He had not enough experience of the matter to say whether there were any signs of that changing. He did not think the reason he had just advanced for Indians not being employed on Railways could apply to the Building and Roads Department, as the work in that Department was not so strenuous.

81,410. (*Mr. Sly.*) He wonld like to see both a Family Pension Fund and a General Provident Fund in operation. Assuming that Government found it necessary to abolish the General Provident Fund, if it instituted a Family Pension Fund, he did not think that would make any difference to the recommendation contained in the written statement. Officers would prefer a Family Pension Fund.

81,411. (*Mr. Fisher.*) A young officer coming out fresh to the Railway Department from England was, to start with, put under an Executive Engineer, or else he was put as an assistant to an Assistant Engineer who was in charge of a sub-division, until he had learnt his way about, and acquired some knowledge **of** the language, which might take him six months to a year. After that he was put in charge **of** a sub-division. He had to pass an examination in the language, and also **a** technical examination. The methods of supervision and training in the early part of **a** young officer’s career were as good as the! could be.

81,412. He was in favour of probationary period in India. It was to be inferred from that statement that **a** certain number of the men who came out to India in the Department were unsuitable and should be discharged. When men went to Coopers Hill, during the three years they were there, it was always possible for the President to get rid of men who were in any way undesirable. At present men went up before the Selection Committee for perhaps **20** minutes, and on that interview and their previous record, they were appointed finally to the service. An opportunity ought to be given to the Government at the end of the year’s probation of getting rid **of** unsuitable men. He thought if the starting salary was raised, much better men would be obtained.

81,413. In existing circumstances there was a sufficient supply of duly qualified candidates for the service, but lie thought the Railway Department was so very much more important than the Public **Works** Department, that the railways ought to offer *a* higher salary, and so get the very pick of the men. **He** admitted that the starting salary **was** higher than the starting salary which would be given by an English Railway Company.

81,414. (*Mr. Nudge.)* He recommended a more frequent revision of the cadre than had been the case in the past. While the railway work had increased, the cadre had not been increased, the result being the appointment of **a** large number of Temporary Engineers. The minimum expenditure on railways for the past ten years was about 9 million pounds. That meant continuous work both in open line and in construction, for which the existing cadre was not large enough.

81,415. With regard to the contraction **and** expansion of railway work, he could not say what was the minimum expenditure on railways in any one year. **At** any rate, it had never fallen so low that a recommendation to increase the cadre could be thought extravagant.

81,416. The difficulty of any scheme of periodically increasing the cadre so as to take in Temporary Engineers would be to know where to put them. Previous attempts to absorb Temporary Engineers had always given rise to dissatisfaction. **He** would not object to Temporary Engineers being brought into the permanent cadre, provided they were not brought in too high.

81,417. Promotion to administrative ranks should be by selection rather than by mere seniority. **At** present this was the rule, ‘and what the service recommended was that that selection should be carried out more thoroughly than it was. What really happened was that it was not so much a system of selection of the best men, as a system **of** elimination **of** the worst men. There must either be a system of selection, or seniority. If it was a case of selection. the Department must accept what came from the responsible authority, and that was precisely what his colleagues recommended.

81,418. The professional education of a local man might be quite good; what he objected to was his general education, and more than that his general character. A man who had been educated in India. who had not been in England, and who had not gone through an English course, had not the same qualities of character as the man from England. **A** man who had not been to England might do very well in the **lower** grades **of** the service, but **he** failed when he reached the higher grades. That remark applied more or less equally to the Anglo-Indian and to the Indian. In any case the Anglo-Indian, the Indian, or the domiciled European, if he was to be appointed to the Imperial Service. should be sent to England.

81,419. He agreed that before the division into Imperial and Provincial branches, some men from Rurki did excellent work in all departments, but that remark did not apply to the average man.

81,420. (*Mr. Abdur Rahim.*) Men who were elected to the Companies’ lines were elected by the Railway

Boards. Vacant posts were advertised in England which might account for the non-employment of Indian Engineers, but he did not think there was the slightest doubt that if the Agents or Chief Engineers of those railways desired Indians for Executive posts in their railway, they would find them. He could not say to what extent an attempt had been made by private companies to get locally trained men. He could only quote figures to show that on the Great Indian Peninsula Railway there were four Indians out of 91 officers, on the East Indian there was one out of 45, on the Bengal and Nagpur Railway there was one out of 66, and on the Bengal and North Western there were none. If Europeans and Indians of the same qualifications applied for a post in a private company, the question of character would probably determine who would obtain it. He agreed that there was a presumption of character in favour of the Englishman. His point was that if the Native States or private railway companies wished to have Indians they would have them; Native States would naturally prefer to have an Indian rather than a European, but the reason they did not have Indians was because they could not get them.

81,421. It was true that on the Eastern Bengal Railway the Chief Engineer was an Indian-trained man. One of his Deputies was also an Indian-trained Engineer, and there had been other Chief Engineers on railways recruited from Indian engineering colleges, who had done excellent service on the railways.

81,422. *(Sir Valentine Chirol.)* One of the most important. contributory causes of the deterioration of the product's of Indian colleges was due to the closing of the, upper branches of the service to Indian-trained candidates. If Rurki was re-opened for Imperial Railway Engineers, they should have two years' English training after they had passed through the Rurki course.

81,423. With regard to his remark that he thought the introduction of a scheme somewhat similar to the Military Service Family Pension Fund might be acceptable to the service, he was aware of the very serious complaints which were made by military men with regard to that particular pension fund. He did not say that that pension fund exactly as it stood was as good as the service ought to get. That was for the actuaries to work out. He had been told that the service ought to get better terms than they did without any extra cost to Government.

81,424. With reference to his admission that in those years when there was a contraction of work on State Railways, there probably would be contraction of work on railways built. by private enterprise, he believed it was the fact that railways built by private enterprise were financed in an entirely different way from railways built by the State, and that those financial conditions did not lead to contraction in the one case, where they did in the other.

81,426. (*Sir Murray Hammick.*) With regard to Temporary Engineers, his suggestion for a separate list was put forward with the object of ensuring definite prospects to Temporary Engineers who had been in the employment of Government. for many years. They should be given an annual or a biennial increment, their salaries should rise to a fixed maximum, and they should come under the 55 years' retirement rule. He would not suggest that any permanent pensionable post should be allotted to them.

81,426. When he suggested that in former days some of the Engineers were given prospects of that kind, he was not referring to Stanley Engineers, but to a subsequent period. For instance, Mr. Haughton, who had been the Chief Engineer of the Eastern Bengal Railway, was a non-pensionable man, and he did not count against the cadre of Superintending Engineers or Chief Engineers in the permanent Imperial list. He, and four other Engineers under the same terms of service, retired under the 55 years' rule, and were permanent to that extent. They were non-pensionable, and they were not guaranteed any special salary. They did actually rise to the highest pay of Executive Engineers. When Mr. Haughton was first made Chief Engineer of the Eastern Bengal Railway, he was counted against the cadre of Superintending Engineers, and there was great complaint. Then he was put outside the scale, an extra post being made for him. The witness agreed that. Government could not be expected to put Temporary Engineers who had over 10 years' service into a special list, with a promise of promotion to administrative posts.

(The witness withdrew.)

J. W. Shore, Esq., Executive Engineer, Eastern Bengal State Railway (representing Provincial Engineers).

Written Statement relating to the Railway Department, being the corporate views of the Provincial Engineers on the Eastern Bengal State Railway.

81,427. **(I.)** Method of recruitment.—The superior posts of the Department are recruited in four ways, *viz.*:—

(i) by Civil Engineers obtained from England,

(ii) by the appointment of Royal Engineers,

(iii) by the appointment of successful candidates from the Indian Engineering Colleges,

(iv) by the promotion of selected officers from the subordinate grades of the Public Works Department.

Recruits from England are appointed by a selection committee at the India Office without competition. The annual recruitment from this source has varied. The number of recruits during a series of years *(vide* the reply given to a question in the House of Commons on the 19th April 1911) is as follows:—

1908	39 recruits.
1909	36 ,,
1910	30 ,,
1911	28 ,,

The annual recruitment in India is approximately fourteen, *viz.*, nine from the successful candidates of the Indian Colleges and five from selected subordinates.

The proportion of recruits from England and from Indian Engineering Institutions, excluding promoted subordinates, is thus approximately thirty to nine. That is to say, only 20 per cent. of the total annual recruitment is obtained from the Indian Colleges and 68 per cent. from England. The remaining 12 per cent. is obtained by promotion from the subordinate grades.

In other words, 80 per cent. of the total annual recruitment is made by selection and only 20 per cent. by open competition.

This proportion of recruitment from the Indian Colleges, which, be it remembered, are institutions maintained at great cost to the State, is thus very small as compared with that from England.

The proportion of recruitment should be contrasted with the position existing at the time of the Public Service Commission 1886–7 and with the recommendations of that Commission. It will be noticed *(vide* page 362 of Appendix C of the appendices to the report of that body) that the annual recruitment from England and from the Indian Colleges was at that time in the proportion of twenty-one to nine, that is to say, the Indian Colleges received 30 per cent. of the total annual appointments. It is therefore manifest that, notwithstanding the fact that the said Commission recommended a gradual increase in the, number of annual appointments to be given to the Indian Colleges by reducing the English recruitment, the reverse has, in fact., transpired.

It is asserted that the legitimate aspirations of the public in India cannot be satisfied unless a greater proportion of the superior appointments in the Public Works Department are reserved for competition in this country. It is suggested as a fair and suitable remedy that at least 50 per cent. of the total recruitment be made in India, and this proportion should be made an absolute minimum, to be worked up to.

Again as regards the system of recruitment in England, the method of selection at present adopted is decidedly faulty as it does not secure the best talent, available. This is forcibly exemplified in the case of

Mr. Teja Sing. This gentleman appeared on two separate occasions in the Entrance Examination for admission into the T.C.E. College, Rurki, and on both occasions failed to qualify. He subsequently went to England, and after going through a course of three years got selected and came out as an Imperial Engineer. Other instances could be mentioned.

It is therefore suggested that this method of selection should be replaced by a system of open competitive examination and there should be no racial limit whatsoever.

In India admission is by open competition, and certain appointments are alloted to certain colleges. It is suggested that in its place there should be one open competitive examination for all students of the recognised Engineering Colleges in India.

81,428. **(II.) System of training and probation.**—(*a*) *Training of men recruited from England.*—There is no guarantee that the preliminary training obtained by these recruits is such as to meet the requirements of the profession in India. The training should be specifically directed to one end, *viz.*, the efficient performance of the duties required of an engineer in India. This can only be secured by competitive examination in which the subjects must be specially chosen and should include one Indian language.

The competition must be real, that is to say, the number of appointments offered must not in any year exceed a fixed proportion of the competing candidates. A suitable arrangement would be that the appointments offered in any year should not exceed one-third of the number of candidates in that year.

The suggestion is by no means unfair when considered with the conditions frequently prevailing in the Indian Engineering Colleges. For example, it has happened at Rurki College that eighteen to twenty-five candidates have competed for five or six appointments. Again, at the Poona College, it has frequently happened that no less than forty to fifty candidates have competed for a single appointment.

(*b*) *Training of men recruited from the Indian Engineering* Colleges.—The training imparted in these institutions, is, it is considered, sound and fairly exhaustive. This fact has, moreover, been admitted by several eminent authorities such as Lord MacDonnell and Sir J. P. Hewett.

Again, this training is directed wholly to the requirements in India.

It is therefore submitted that from the point of view of Indian requirements the training received by Indian College Engineers is, in fact, superior to that received on the average by engineers obtained from England. In addition, the Indian College recruit possesses the great advantage of receiving his training in the country in which he has to practise his profession.

(*c*) *Probation.*—The training received by the *alumni* of the Indian engineering colleges is further supplemented by a period of probation for one year in the department, which is not the case with recruits obtained from England. This probationary period in the department is absolutely necessary and should be insisted upon as an indispensable condition, and it should, in addition, be a probationary period in the strictest. sense, involving selection and the possibility of rejection at the end of it. Any plea that this is unfair or will deter candidates from England by reason of the attached risk may be met by the provision of free return passages to rejected probationers.

This. except for the free passage. is exactly what prevails at the present moment.. in the case of recruits from Rurki College.

81,429. **(III.) Conditions of** service.—The conditions of service of recruits appointed in England and India differ very considerably and this is the sole cause of the great discontent which prevails among the latter class of officers throughout India.

Notwithstanding the fact that both classes of officers are recruited for and required to do exactly the same work and bear the same responsibilities and burden, the position of officers recruited in England is more favourable in every respect as compared with that of officers recruited in India.

The policy which, in fact. has prevailed, since the date when effect began to be given to the recommendations of Public Services Commission of 1886–87 has undoubtedly been one of monopoly and exclusion and it has been consistently worked in a manner adverse to the interests of the officers trained in India.

The position thus created is absolutely illogical and unjust, and cannot, in view of the surrounding circumstances, be supported. Prior to the Public Services Commission of 1886–87 there was no distinction in the Public Works Department between officers recruited in India and England, and it is a fact that, of all the branches of the public services in which the Indian-recruited and imported elements were formerly on an equal footing, the Public Works Department was the only one in which a differentiation was introduced. No such change whatever was introduced in other branches of the public services, *e.g.*, the Accounts, Finance, &c., .in which exactly similar conditions prevailed, *i.e.*, in which all officers, whether recruited in England or India, were on a full equality.

This not only dispossessed the public of the only sources, in India, of recruitment to the Public Works Service on an equality with officers from England by free and open competition but it. also created an invidious and unjust distinction between men born, domiciled, educated and recruited in this land.

By retaining the former conditions in the case of these said other services and introducing this adverse change in the case of the *alumni* of Indian Engineering Colleges the result has been that recruits entering these other services have secured vastly better conditions than recruits entering the Public Works Service through these said Engineering Institutions.

The position of the Provincial Engineer on State Railways is specially anomalous. He works side by side with members of the Traffic and Locomotive Departments and although a proportion of appointment's of Traffic Department are filled by recruitment in India, it is only the Provincial Engineer who is subjected to the two-third salary rule as compared with men appointed from England. In other Departments the grade pay is the same whether the appointment is made in India or in England. Again, while members of Traffic and Locomotive and Accounts Departments come under the European Service Leave rules as soon as their pay amounts to Rs. 900, the Provincial Engineer has to remain under Indian Service Leave rules throughout,. The only reason, why these officers are so treated can only be, that Railways is looked upon as a highly specialised service and as such, there is no reason why the Engineer officer recruited in India, should not be placed on the same footing with his brother Engineer officer recruited in England, as are the officers of the Traffic and Locomotive Departments.

Again, while this great distinction was created in respect to the pick of the Indian Engineering Colleges, men thrown out from the self same colleges and entering this and other departments have been differently treated. The facts and arguments in connection with this particular matter which are of the utmost importance as they vitiate this whole idea of differential treatment, refer to the case of certain Temporary Engineers, all Rurki men, who many years after this distinction between officers recruited in England and India had been created, were recruited to the permanent establishment of the Public Works Department and placed not in the Provincial Service but on a level with officers recruited from England in the Imperial Service.

The deep significance of this will be more readily and forcibly recognized when the following facts are taken into consideration:—

(i) These officers with one single exception passed out of Rurki College after the Commission had discovered that this Institution did not afford a training equal to that obtained in England.

(ii) They had failed to secure guaranteed appointments when competing for them and had consequently no claim to treatment better than those who stood higher than them and secured guaranteed appointments.

(iii) The majority of them had failed to secure the necessary percentage of marks (*viz.*, 66 per cent.) required in order to qualify for Government appointments, and were therefore not eligible, under the rules of the Institution which trained them, for permanent appointments at all. That is to say, they could not, with the percentage of marks obtained by them, have obtained guaranteed appointments even if they had in fact headed the examination lists in their respective years.

(iv) Several of these officers namely, Messrs. E. H. Purves, F. M. Purves, W. C. Muller, C. H. Muller, W. H. O'Neill, E. S. Christie, W. C. Cooper, etc., in addition to not having secured guaranteed appointments, were specially barred from being appointed to the Imperial Service in consideration of the fact that one and all obtained less than the required 66 per cent. of the total marks. They were further barred under Government of India Resolution, No. 2112-G., of 19th July 1892, paragraph 2, which laid down that those students who within three years from date of the resolution succeeded in obtaining appointments would be admissible under the old (Imperial) rules. Even ignoring the disqualification stated in *(iii)* above they were only eligible for the Provincial Service.

(v) In case of one officer Mr. Jeffries, who failed to qualify abssIntely in Rurki College and took up an appointment in the service of the State as a temporary sub-overseer on the Rajputana Malwa Railway, he was subsequently engaged in a subordinate capacity as Temporary Sub-Engineer in the Punjab, and later appointed as a Temporary Engineer, from whence he was translated to the Imperial Engineer Service. This is, therefore, a case where an unqualified person has risen from the lowest rung of the ladder to the Imperial Service long after the Provincial Engineer Service was established, and this should be contrasted with the treatment accorded to the pick of the Indian Colleges against whom the door to similar advancement is absolutely shut now.

It stands revealed therefore that the Government have virtually admitted that Engineers trained in India, even subsequent to the Commission's findings, are not inferior to men recruited in England, and that they are fully qualified to be placed on an equality with the latter, that is in the Imperial Service. It is therefore submitted that there should be absolutely no distinction whatever between Engineers recruited in England and in India.

81,430. **(IV.) Conditions** of salary.—The *pay* of the Indian recruited element is approximately two-thirds that granted to officers recruited from England. This is utterly unfair and unsuitable. The resulting anomalies and defects are as follows:—

(i) The minimum pay of Indian-trained Executive Engineers is much less than the maximum pay of Imperial Assistant Engineers.

(ii) The minimum pay of Indian-trained Superintending Engineers is less than the maximum pay of Imperial Executive Engineers.

(iii) Anomalies exist in connection with local allowances as stated below.

(iv) Generally the pay granted to the Indian-trained element is inadequate and is not commensurate with their work and responsibilities.

It is thus clear that Indian-trained Engineers in certain cases receive less pay than officers of a lower grade under them. This position is untenable. It is contended that emoluments should depend on service rendered, and that the distinction between the two classes of officers who do the same work should be obliterated.

Local allowances.—Here Indian-trained Engineers receive two-thirds the local allowances granted to officers obtained from England. This difference is unjust, for the said allowances are always given for a specific purpose, that is as compensation for local disabilities which equally affect both classes of officers.

Probation period.—Not only have Indian-trained officers as already explained, to undergo a probationary period and thereby incur the consequent risk of rejection, but even after completing such probation the period so spent is not counted for increments and promotion. This affects their seniority as compared with Imperial Engineers.

It is contended that there should be absolutely no distinction whatever in the matter of emoluments of whatever nature between the two classes of officers but that emoluments should depend solely on services rendered and not on place of recruitment.

81,431. (V.) **Conditions of leave.**—Here, again, there is much disparity between the conditions prevailing as regards both these classes of officers. Great stress has been laid on the advantage to be derived by an engineer visiting works in foreign countries, and the imperial element of the department has received undue credit on this account. Unless the ronditions of leave are the same, it becomes impossible for Indian-trained men, even if they desire to do so, to secure the same advantages in this direction as Engineers recruited from England.

Again, the nature of an officer's duties in the Public Works Department involves continued exposure and discomfort for long periods, and the health of Indian-trained officers suffers equally with that of imported men. There is therefore no reason whatever to perpetuate the present distinction. Indian College Engineers should therefore receive exactly the same Leave conditions as their contemporaries recruited in England. It is generally recognized that Indian-recruited engineers break down in health earlier than men obtained from England, and this is due to insufficient rest.

Again, officers recruited in India in certain other services for example the Locomotive, Traffic, Accounts, Opium, Finance, etc., are under more favourable Leave rules, and there is no reason why Indian-trained Engineers should not be on an equal footing with these other services.

Again, as regards privilege leave, we would suggest that it be allowed to ordinarily accumulate to four months and if the exigencies of service prevent this leave being taken within the period, then a further accumulation of two months and up to a limit of six months should be made permissible.

As regards furlough, we would suggest that officers recruited in England should be allowed more furlough than those recruited in India by one-eighth the maximum amount that may be allowed to the latter and that the furlough allowances of the former should exceed those of the latter by one-eighth the amount due to the latter.

As regards combined leave, it should be permitted up to a period of 2½ years.

81,432. **(VI.) Conditions of pension.**—Here, again, there is a much resented distinction (vide article 636, Civil Service Regulations) which creates invidious and unjust anomalies.

For example, an Indian-trained Chief Engineer draws less pension than his own subordinates recruited from England. It is submitted that it is a well established principle that pensions are granted as a retiring provision *for* specific services rendered to the State, and it is therefore illogical and unjust to create and to maintain any distinction in this direction between persons who have in fact rendered exactly the same services. In other words, pension ought to be wholly and solely dependent on specific services rendered, and not on place of original recruitment; for this does not involve any special merit.

81,433. **(VII.) Limitations in employment of non-Europeans and the working of the existing system of division of services in the Public Works Department into Imperial and Provincial.**—As regards the above, the department should be recruited half from England and half from India for the present. The recruitment in England should be open to all British subjects equally, irrespective of domicile, caste, colour or creed as is done in India. Lately during the existence of Cooper's Hill College only two Indians were annually eligible for appointment even after competition, and at present the number of Indians eligible for appointment is limited to 10 per cent. of the total annual recruitment. Limitations of this nature should be removed.

The division of the Public Works Department into Imperial and Provincial sections has been anything but a success, and can never be so in view of the surrounding circumstances and of the past history of the department. The distinction thus created between the two classes of officers is intensely resented, and will inevitably result in splitting up the whole Public Works Department into two hostile camps and this must greatly injure efficiency. The interests of the two classes of officers are now widely divergent, and the general feeling of esprit *de corps* which formerly prevailed has ceased to exist. In its place there sprung up a deep and widespread feeling of suspicion and distrust between the two classes of officers, which must wreck harmonious working.

So long as the two classes possess, on the average, equal educational and professional attainments— and this is undoubtedly the case—any differentiation between them is invidious and unworkable.

It is impossible to enforce *a* distinction in pay where none exists in attainments and work, and any attempt to do so must create complications and raise issues which it would be as well to avoid. Again, it is in fact true that many Indian-trained Engineers possess superior qualifications to some officers recruited from England.

81,434. (IX.) Other points.—No *analogy exists with* ***other*** Provincial services.—It is widely felt that the resistance offered to the oft-repeated prayer of the *alumni* of the Indian Engineering Colleges to be restored to the position they formerly occupied, that is on an equality with recruits from England, is due in *a* great measure to the apprehension that if this is conceded, other Provincial Services would be entitled to similar treatment.

It is submitted in reply that the question of other Provincial Services is foreign to the point at issue. There is no parallel between the case of Engineers recruited in India and other Provincial Services. Engineers recruited in India are not situated in the same relation to Engineers recruited from England as members of other Provincial Services are to the Imperial officers of those services; but, on the contrary, except as regards the amount of pay, leave and pension, there is, in all other respects no distinction between the two classes of officers in the Public Works Department.

It is therefore submitted that any argument opposing the restoration of the *alumni* of Indian Engineering Colleges to the position they formerly occupied on ground that this would entitle other Provincial services to similar treatment is unsound and can not prevail.

Temporary Engineers.—This is another source of recruitment for the department. But Temporary Engineers should not be brought on the permanent list, as, by so doing. the interests of the permanent men already in service are greatly affected. Their employment should be strictly in accordance with the provisions of the P.W.D. Code, Vol. I, Paragraph III, Rules I—V. But they should not be employed on general works to supplement the permanent establishment *as* laid down in Rule VI of the same paragraph. If the permanent cadre is at any time found insufficient, it should be augmented by allotting more guaranteed posts, which should be divided equally between India and England.

Temporary Engineers should always be recruited from the qualified students of the Indian Engineering Colleges and from no other source.

Mr. J. W. **Shore,** called and examined.

81,435. (*Chairman.*) The witness said he was an Executive Engineer of twenty-three years' service, and represented the Provincial Engineers on the Eastern Bengal State Railway. He was trained at Rurki. At the time the written statement was drawn up he represented four officers, but now there were only himself and one other officer.

81,436. He recommended the creation of one superior service and would like to see competition both in India and in England, 50 per cent. being given to each country. In the 50 per cent. from England he would include Royal Engineers. He did not see why there should be *a* limit of 10 per cent. on the number of Indians recruited in England. He objected to the system of selection of candidates with full qualification on the ground that it was impossible by looking at *a man* for half an hour or five minutes to tell what his character really would be. Observation and experience in actual work alone could detect whether *a* man possessed or was likely to acquire the qualities of resourcefulness, tact, and organisation necessary for an Engineer. **He** judged the system of selection by results, as the men who had got in appeared to show that the system of selection was not sufficiently careful. His objection was mainly directed to the selection of the **10** per cent. of Indians in England, but he extended it also to European candidates in England selected by the Secretary of State. Of recent years the men from England had been no better than those from India; they had not been up to the standard of work required in India. The recruitment of indifferent officers commenced about **1903-04,** complaints having been made about the men who then came out. Even in recent years there had been men not up to the standard of work required for India. Officers might come out from Engineering Colleges with full qualifications, but a man might be fully qualified and yet be wanting in character.

81,437. He advocated open competition combined with selection as was the case with men who came from Rurki. He would admit *a* number of men into the service over and above the number required, and at the end **of** the probationary period he would appoint only those who had proved efficient. There was no probation now for men coming from England.

81,438. The technical efficiency of the men from England was good, but he objected to the character of some of them, and that fault could be remedied by selection after open competition followed by probation. A recruit after passing an open competition should come out to India and be placed on practical work, and after he had been **a** year or two in the service it could be judged whether he was eligible for retention or not. Probably his object might be better met by instituting a probationary period in England, and he would like to see probation tried. Those who proved themselves unsuitable after *a* year or two should be rejected.

81,439. All officers in the superior service should be under the same terms as to salary. Even assuming invidious distinctions were removed he would not agree that an officer from Europe should be granted a compensation allowance, as that would be perpetuating the present invidious distinction under another name. There would be no grievance in regard to title provided that the men doing the same work received the same salary. He did not accept the principle that every officer serving in *a* foreign country should get *a* foreign service allowance: it did not apply to men from England going to the Colonies and it should not apply to India. Higher salaries were only given *to* men who were brought in to a country as experts. If, however, the principle of paying higher salaries to imported **officers** was general, it might be followed in India, provided the difference was not made too great, and confined to the grade of Assistant Engineer, *e.g.*, if the young man from England started on Rs. 380, the man from India might be started on Rs. **280** and this difference might be maintained throughout the time the two men were in the Assistant Engineer Grade. But as soon as selection was made for promotion to Executive rank, the salaries of the two men should be levelled up for the purposes of the maintenance of proper discipline. At present as Executive Engineer of 3½ years' standing on the Provincial Cadre the witness was drawing Rs. 570, whereas one of his Imperial Assistants was drawing Rs. **750,** while the other, with only five years' service, was drawing Rs. 580. The man drawing the larger salary very naturally considered himself the better man and it obviously became extremely difficult for the Executive Engineer placed in such **an** invidious position to maintain proper discipline and to exact that respect and obedience for his orders which were so necessary for executive control and efficiency.

81,440. The question of *a* Family Pension Fund had not been generally considered, but officers were of opinion that it would be a great boon if such a fund were **created**

81,441. He advocated a central college as giving a more efficient training. **The** other colleges in India might train men for the subordinate ranks.

81,442. He was opposed to the inclusion of any temporary officers in the permanent cadre on account of the grievance it would create. A large number of the present temporary officers were carrying out permanent sub-divisional work and in some cases held divisions. The appointment of Temporary Engineers to permanent posts would not affect the men who were in the service adversely provided it was understood that they were only there temporarily until such time as permanent cadre men serving elsewhere were available. A possible solution of the difficulty would be to add to the Upper Subordinate cadre definitely permanent posts which had been occupied by temporary officers for eight years and upwards.

81,443. In addition to adding definite permanent posts to the Upper Subordinate Cadre, it would greatly help if arrangements could be made with Municipalities, District Boards and Railway Companies to apply to the different Local Administrations for their Engineers. Temporary men could thus be amply provided for.

81,444. (*Sir Murray Hammick.*) He had not bcrn able to go to England owing to the smallness of his pay and furlough allowances. He was aware that the pay of the Civil Servant in England was much lower than that of the Indian Civil Servant in India. There was justification for giving the Civil Servant an extra allowance to attract him to India, but there was no justification for treating the engineering service in that way. In the Civil Service the two men were doing absolutely a different class of work, whereas in the Engineering Department they were doing the same work. If leave and an adequate pay and furlough allowance could be obtained he should like to go to foreign countries to travel, as travel was study. At present neither pay nor leave nor allowances were sufficient.

81,445. He had put in an individual written statement which differed on the subject of furlough from the joint memorandum submitted. An officer from England should be given more in the way of furlough than officers from India on account of their domicile being so far away; but he would make no differentiation in the allowance. All he asked for was equal pay, sufficient allowance and time, for the purpose of study.

61,446. (*Sir Valentine Chirol.*) With regard to the question of salary. he would not admit that his argument pointed to the reduction of the salaries of European recruited engineers, rather to the raising of the salary of Indian recruited engineers. The Indian recruited engineer had to maintain his position in India relatively to the officers of other services with whom he came into daily contxct. It was not possible to lower an officer's salary without affecting his status. The salary of the department should be fixed on the Imperial scale, which was more or less an approximation to that fixed for the other services.

81,447. Men recruited in India were as well qualified to do the work of the department as men recruited in England, but they could not be obtained at a rate of salary considerably less than that paid to the European recruited man. As explained above, there was discontent when the Executive grade was reached and the position of the Indian recruit became anomalous and the distinction grew invidious and pronounced. The men recruited for the Provincial Service were competent to discharge the same duties as the men recruited from England. They were recruited on certain scales of salary which were lower than the scale paid to European recruits : it was quite true efficient officers had been obtained at the lower salary, but because of a promise held out the men had lived in the hope of having their grievance remedied one day. The deterioration had not really set in yet, but if present conditions continued there must inevitably be deterioration ; this was the general consensus of opinion. That fact could be more or less gauged from the action taken by different schools and colleges. Manor House, Mussoorie, had ceased to educate boys now for Rurki simply because it could train them for other professions where the conditions and pay were more satisfactory, such as Law and Medicine and Accounts.

81,448. With reference to the instance quoted in the written statement of a man who failed at Rurki having gone to England and qualified, it was possible to assume that the course of three years he had taken in England qualified him for service in the higher branch, but there were other cases where men had failed in India and gone to England for eighteen months and returned as Imperial officers.

81,449. (*Mr. Abdur Rahim.*) If two men were working side by side and doing the same work and one man was paid considerably less than the other, that man would naturally be discontented with his position.

81,450. He did not wish to see the service preponderatingly Indian, but desired a gradual increase in the number of men trained in India up to 50 per cent.

81,451. For work in India an English education did not confer any advantage, because the kind of work in the two countries was quite different. In England most of the work was done'by contract agency, the engineer officer simply laying out and supervising, whereas in India the Engineer had also to do the general drudgery and organisation and discover ways and means. Training in India qualified a man better for the work to be done in India than training in England, and equipped the officer better for controlling men of this country. He could not see that there was anything different in railway work from other engineering work; it was just a matter of chance whether a man was put on to roads, railways, or irrigation, although, in the case of the Indian recruit, it was more or less a matter of selection according to his position on the list. Railway work was strenuous and required stamina, but no special selection was required.

81,452. The only special branch was Signalling and Interlocking, for which specialists were brought out. But there too there were two Rurki men (E. A. Scott, Head Signalling Engineer, North Western Railway, and F. E. Cole, Head Signalling Engineer, Eastern Bengal State Railway) who threw up their posts as Provincial Engineers and took up Signal Engineering, and who were to-day considered specialists.

81,453. (*Mr. Madge.*) It was the general consensus of opinion that the division into Imperial and Provincial branches was bad.

81,454. He had had working under him men recruited in India and in England and found they worked equally well.

81,455. The present cadre was insufficient and required expansion, and in that expansion there would be no objection to taking in the best of the temporary men if no block was caused and no grievance raised by so doing.

81,456. (*Mr. Fisher.*) The new bridge which was being constructed over the Ganges had been imported in sections from England, but an Indian recruited man was quite as capable of putting up the bridge as a man recruited in England. Many of the bridges in India had been brought out in sections and put up by Indian-trained Engineers. He admitted that a great manufacturing country like England, with a long tradition of mechanical and electrical engineering science, obviously had advantages in those lines which could not be offered by an agricultural country like India, but he was speaking chiefly in regard to civil engineering, and he did not admit that a man was not really a good civil engineer without a very good grounding in mechanical engineering.

81,457. He did not say that training in England unfitted a man for work in India, but he did say that the man recruited in India was more capable, especially in the first years of his service, of controlling work in this country because of his special training and his knowledge of the language and of the people.

81,458. (*Mr. Sly.*) At present he controlled two subdivisional charges. About six months ago he had under him one Imperial English-trained Engineer and one Indian Temporary Engineer. He had had two Imperial Engineers serving under him. He did not mean that the whole of the men recruited from England since 1903–04 were inferior, but quite as large a proportion of the men who came from England were as inferior as the proportion of the men who joined in India. He based that conclusion not only on the experience he had had, but also on what he had heard from other administrative officers in general conversation, particularly at the time when Cooper's Hill was abolished and the present system of recruitment adopted. The average Indian-recruited Engineer was a.s good as the average European.

81,459. One of his remedies for improving the quality of the English Engineer recruited in England would be a competitive examination which included one Indian language. He did not think that would act as a deterrent to a man entering the service, as if a man wished to come out to India he would give up a certain amount of time to study the language. When Rurki was the only means of admission to the service men came from England and other countries to compete for admission to the college, because at that time the college was the only source of recruitment; and if men came out then there was no reason why they should not come out now. He had no statistics[*] ready showing how many men came out to Rurki at that time, but in 1868 two men came and many others between 1866 and 1878.

81,460. Stokes' School at Mussoorie was closed simply because the terms of service of Rurki trained Engineers were changed and they could no longer obtain men of the class they were accustomed to train. Stokes' School was a school for general education, but a very considerable number of the men who joined the Engineering service in the early days came from that school.

81,461. (*Sir Theodore Morison.*) The officer referred to in the written statement, Mr. Teja Singh, was recruited under the rule that Natives of India should be selected to the extent of 10 per cent., and taking it that there were thirty vacancies in that year three of the candidates had to be Indian, and as long as they fulfilled the conditions they had to be selected. If Mr. Teja Singh's had been an isolated case it probably would not matter, but two European lads, who had gone to England from Rurki—one from the Upper Subordinate class—as failures, had returned to India as members of the Imperial branch. It was possible that this was because they were statutory natives of India, but they might have competed under Rule 5. They certainly would not have obtained appointments in India on their qualifications.

(The witness withdrew.)

F. W. ALLUM, ESQ., Superintending Engineer, State Railways, [Officiating Senior Government Inspector of Railways], (representing Imperial Service Engineers on State Railways appointed in India).

Written Statement relating to the Railway Department, being a Memorandum on behalf of Imperial Service Engineers on State Railways who have been appointed in India.

81,462. **(I.) Method of recruitment.**—All Engineers permanently appointed to the Indian Public Works Department should belong to one service. They should be recruited in England and in India in the proportion of 2 to 1.

Recruitment in England should be by competition in a single institution on the lines of the late Royal Engineering College at Cooper's Hill. All British subjects should be allowed to compete. Candidates should be not younger than 18 nor older than 21 years at entrance, and the technical course should be for 3 years with a year's practical training in England or India after selection. If, however, the present selective system is retained five per cent. of the total number of appointments should be allocated to natives of India who have spent not less than 4 consecutive years in England at the time of selection: applicants must produce evidence of adequate school education followed by three years of technical training at a recognised institution and one year's practical work: age not to exceed 25 years.

Recruitment in India should be by competition through the present Indian Engineering Colleges. The entrance examination should be of a high standard and competitive: in view of paragraph 5 below (*i.e.*, present paragraph 81,463), it should only include an Indian language among the optional subjects (of which there should be several) but a high standard in English should be demanded. The course in College should last three years and be followed by one year on works. Entry into College should be between the ages of 18 and 21 and high marks should be given during the College course for physique, proficiency at games, and general fitness for the calling of an Engineer.

81,463. **(II.) System of training and probation.**—The first three years of service in India should be probational, after which the recruit would he appointed permanently if the Government were satisfied of his fitness.

An examination in Indian Engineering and Government Accounts relating to the work the officer has done, and another in an Indian language (entirely practical and oral with particular regard to pronunciation) must be passed by all members of the service within 5 years of appointment.

Indian appointed Engineers who have passed the probationary period should be compelled to take one year's furlough between the fifth and tenth years of service to study in Europe or America a branch of Engineering in which they are specially interested.

81,464. **(III.)-(VI.) Conditions of service, salary, leave, and pension.**—We agree with the remarks made under these heads in the written statement of the Civil Engineer's Association[*] and have nothing to add to them.

81,465. **(VII.) Such limitations as may exist in the employment of non-Europeans and the working of the existing system of division of services into Imperial and Provincial.**—We agree with the Association of Civil Engineers that the European element must preponderate for some time to come in the Public Works Department of the Government of India if the present standard of efficiency is to be maintained, hut we consider that this condition will be sufficiently served if the appointments made in India are a third of the total number available, in addition to those Indians who are allowed to compete for appointment in England as explained in paragraph 81,462.[†]

So far as the State Railway Engineering Service is concerned it is impracticable to employ side by side two different classes of Engineers, one of which has better qualifications and better prospects than the other: the work is always of the same importance and responsibility, and the same punishment is measured out to those who fail in their duty: it follows that the present system of "Imperial" and "Provincial" Engineers is inequitable.

81,466. **(VIII.) Relations of the service with the Indian Civil Service and other services.**—These are satisfactory.

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[*] The witness subsequently furnished the following list of men who came from England and other countries to join Rurki College.

Year.	Name.	Place from.
1866 ...	F. T. Hall ...	England.
1868	H. Graves ...	Do.
	H. Palmer	Do.
1869 ...	C. Evans	DO.
1870 ...	H. J. Leupolt ...	Switzerland.
1871	E. W. Fosler ...	England.
	A. Colquhoun ...	Germany.
	W. A. Lesmond ...	England.
1872	G. C. Kauntze ...	England.
	G. M. Field	
1873	F, G. Fox	St. Paulinas, Yorltshire.
	A. J. Jones	England.
	A. Grant	Scotland.
1874	F. J. McLaughlin ...	Birmingham.
	O. G. Smart	Edinburgh.
	R. H. McLaughlin ...	Birmingham.
	B. W. Beale	Royal Naval School, London.
1875 ...	W. J. Greer ...	England.
1876	4. M. Reuther ...	Esslingen (Wurtemberg).
	L. G. Evans	Alexandria.
1877 ...	B. C. Bensley ...	Godolphin School, London.
1878	W. E. Rennet ...	Liverpool College.
	R. L. Heinig ...	Edinburgh High School.

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[*] *Vide* the evidence relating to the Public Works Department, Volume XVI.. paragraphs 72,157-60.

[†] The only pure Indian Officer of the class to which this memorandum relates who has sent me his views considers that an equal number of Engineers should be recruited in England and India.

81,467. **(IX.) Any other points within the terms of reference to the Royal Commission not covered by the preceding heads,—We** endorse the remarks made in the written statement of the Civil Engineers' Association* on the inadequacy of the existing travelling allowances on transfer and the inadequate recognition of Engineers in the Honours' Lists.

There are at present only 12 Imperial Engineers in the State Railways who have been appointed in India and it would be a small but appreciated concession to extend to them the privileges of the leave and pension rules which apply to Imperial Engineers appointed in England, among whom are Indians and Europeans who were educated for the most part in India. In this connection the following remarks in the written statement of the Civil Engineers' Association* are quoted to illustrate the general feeling:—"There is a strong wish among the members of this Association that there should be one set of leave and pension rules for all Civil Engineer Officers on the Imperial List irrespective of the source from which they were recruited. The Association considers that such differentiations as still exist should be abolished."

Mr. F. W. ALLUM called and examined.

81,468. (*Chairman.*) The witness appeared on behalf of the Imperial Engineers on State Railways who were appointed in India prior to the creation of the Provincial Service. They were twelve in number and now occupied the following positions:—one Chief and one Deputy Chief Engineer of the Eastern Bengal State Railway, one senior Government Inspector in Calcutta and another in Bombay, one Deputy Chief Engineer on the North-Western Railway, and seven Executive Engineers. Of the twelve, three were pure Indians, one of whom was Chief Engineer of the Eastern Bengal State Railway and the other two Executive Engineers. All were recruited from Rurki except one who came from Sibpur.

81,469. He desired to see these twelve officers enjoying the same leave and pension rules as officers in the Imperial Service. At present they got only two years' furlough after eighteen years' service. No officer could obtain pension until he had completed thirty years' service. Promotion to the administrative ranks was strictly by selection, and when a man reached the administrative grades after about twenty-three years' service he could not retire if he was not selected because he was not entitled to pension and was compelled to stay in Government service without any prospects of further promotion. Many Indians had gone to England and joined the Imperial Service who were for all practical purposes educated in India, and they were now enjoying the European Service Pension and Leave Rules.

81,470. The proposal in the written statement was to break down the division into Imperial and Provincial branches and to recruit one-third of the superior service in India and two-thirds in England. He had not considered the question of concentrating the training for the superior service in one college, but he thought it would be a good idea to do so. At present Rurki had only accommodation for about twenty students a pear in the engineering class, whereas if one college was established for the whole of India accommodation would he required for nearly sixty. The establishment of a central college would raise the difficulty of deciding what shonld be done with the existing colleges.

81,471. Assuming that a single college was not established in England on the lines of Cooper's Hill, and the present system of selection from the varions colleges was maintained, the mandatory 10 per rent. should be reduced to 6 per cent. of the statutory natives of India.. That suggestion was made simply to provide for cases where parents preferred to send their children home to England to he educated. Many Indians and a good number of Anglo-Indians believed it mas better to send their children to England for education, and no doubt those children would wish to come bark to the country. He did not think it really mattered whether selection was made in England or in India. The one-third recruitment in India should be from the Anglo-Indian, Eurasian, and Indian communities by competitive examination. and each candidate should have some sort of certificate as to character and ability in games and athletics. The examination should be an open competitive one for the whole of India, irrespective of colour, race, or any other consideration. He did not anticipate any danger of one race or province swamping the service. All officers appointed to the superior service should be compelled to take a pear's training away from India.

81,472. The practical work recruits appointed from England would obtain in India was just as likely to be of value to them as a year's training on works in England. The last few batches from Cooper's Hill had their practical training in India and those of them he had come in contact with were very good.

81,473. All officers of the superior service wherever recruited should receive the same pay for doing the same work. The proposal to grant a compensation allowance to men coming from Europe was a specious proposal but not sound. In the world's market if one man could do the work as well as another lie was entitled to just as good a salary. The Government should offer terms which would induce Englishmen to come to India, and the fact that other people in India were getting the same terms ought not to have any influence on the question at all. From the point of view of Government he admitted it was a question of econoniy, but economy should be secured, if it had to be secured, by reducing the strength of the service. If Government was unable to attract a really good man without offering a foreign service allowance, then possibly it might be given, but it shonlcl he remembered that Anglo-Indians were as anxious to send their children to England for education as officers who had come from Europe. Most of the Anglo-Indians in India were in their present position simply because the preceding generation had not had the opportunity of going to England.

81,474. For some time to come there should be a preponderance of European-trained officers in the service. The suggestion that the proportion should be two-thirds was only an estimate, and with the 5 per cent. Indians recruited in England the Indian recruitment would be 38 per cent.

81,478. (*Lord Ronaldshay.*) At present not more than one-third of the department could be recruited in India and that was the reason why he urged that for some time to come a considerable proportion of the service should be imported from England. If all the men required of the necessary standard could be recruited in India. it would probably not he necessary to pay them the salary that was now being paid to the imported officer. If there was no imported element in the service the market rate would not. be so high as that' commanded by the imported element at present. A number of Europeans came to India without any guarantee of Government service. In his opinion if the officers recruited at present in India were paid on the same scale as imported officers they would he paid above their market rate if there was no imported element, but the Commission would be justified in reporting to Government that men who were doing the same work should get the same mages. That principle had been laid down already by Government as the only basis on which men should be paid and was the only principle the men would consider satisfactory.

81,476. The English engineering officer who came to India in Government service received a higher rate of pay than he would receive in England, but that was paid to induce him to come out to do work which could not yet he done by the indigenous element. The European came to India because under the present economic conditions he made a better income than he could make in England.

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* *Vide* the evidence relating to the Public Works Department, Volume XVI, paragraph 72,163.

* *Vide* the evidence relating to the Public Works Department Volume XVI, paragraph 72,160.

81,477. (*Sir Theodore Morison.*) An Anglo-Indian, if offered work in India and in England at the same wages, would prefer England; he would be quite as willing to go to any English-speaking country as he would be to serve India.

81,478. (*Mr. Fisher.*) He had no experience of Indian engineers who had been recruited in England.

81,479. (*Mr. Madge.*) He thought men would try and get into a central college from all over India and that there would not be any preponderance of one class. It might be of importance in the judicial and executive branches to have representation of particular provinces, but for a department like the Public Works Department the thing *to* he looked at was professional equipment and not a man's race.

81,480. (*Sir Valentine Chirol.*) He did not think that Rurki could produce as good a class of men to-day as when he left twenty-three years ago. That was probably because a large number of people now went to England for their education instead of to Rurki. A very important matter for consideration was that, owing to the present fashion of seeking education in England, the schools in India suffered. The best boys left the schools at the age of fifteen or sixteen, just when they were beginning to be valuable to the schools and the discipline of the schools suffered from their removal. The teaching also suffered because as the older boys were all sent away the schools became nothing more than preparatory schools. To an Anglo-Indian that was a matter of very grave importance.

81,481. (*Sir Murray Hammick.*) If appointments to the Imperial Service were guaranteed in India, the old class of boy would probably again go to Rurki and to a large extent the exodus to England would cease. A large number of boys were being sent home at considerable sacrifice because they could not now get into the Imperial Services in India. Therefore it would be desirable that Rurki should be opened again for recruitment to the Imperial Service. It was the closing of Rurki to the Imperial Service along with other departments that led to the downfall of Stokes's School. The fact that so many departments of the Imperial Service had been closed to boys educated in India had encouraged the sending of boys to England and had brought about the deterioration of Indian schools. Some schools had been shut up because parents considered that if only subordinate appointments were open to boys educated in India they might just as well send them to cheaper schools. St. Paul's School, Darjeeling, for instance, sent all its best boys to England. Those who stayed on had nothing to look forward to, and they were absolutely a source of injury *to* the school.

(The witness withdrew.)

At the India Office, London, Monday, 4th May, 1914.

PRESENT:

THE RIGHT HON. THE LORD ISLINGTON, G.C.M.G., D.S.O. (*Chairman*).

THE EARL OF RONALDSHAY, M.P.
SIR MURRAY HAMMICK, K.C.S.I., C.I.E.
SIR THEODORE MORISON, K.C.I.E.
SIR VALENTINE CHIROL.
MAHADEV BHASKAR CHAUBAL, ESQ., C.S.I.
ABIIUR RAHIM, ESQ.
FRANK GEORGE SLY, ESQ., C.S.I.
JAMES RAMSAY MACDONALD, ESQ., M.P.

M. S. D. BUTLER, ESQ., C.V.O., C.I.E. } (*Joint Secretaries*).
R. R. SCOTT, ESQ.

HERMANN A. HAINES, Esq., Secretary, Public Works Department, India Office.

Written Statements relating to the Public Works and Railway Departments.

I. *Extracts from a Memorandum on appointments made by the Secretary of State for India in Council.*

81,482. *Indian Public Works Department and Indian State Railways. (Engineering Branch).*—The present system of recruitment was adopted in 1905 after the closing of the Royal Indian Engineering College, Coopers Hill. The appointments are widely advertised in the Press, and the selection of candidates is made by a Committee of three persons appointed for the purpose each year by the Secretary of State. This Committee has on each occasion consisted of (1) the Member of the Council of India who is Chairman of the Public Works Committee; (2) Colonel Sir John Ottley, K.C.I.E., formerly President of the Royal Indian Engineering College, Coopers Hill; and (3) one member nominated by the Council of the Institution of Civil Engineers. In 1910, 1911, 1912 and 1913, the Committee consisted of (1) Sir Hugh Barnes, K.C.S.I., K.C.V.O.; (2) Colonel Sir John Ottley, K.C.I.E., R.E.; and (3) Sir Alexander Binnie, Kt.

Indian State Railways (Assistant Traffic Superintendents).—For these appointments recruitment is made three-fifths in England and two-fifths in India. The recruitment in England is not undertaken at fixed periods, but on a specific demand from India for a stated number of men. When such a demand is received a Selection Committee (consisting generally of the Member of the Council of India who is Chairman of the Public Works Committee, the Government Director of Indian Railway Companies, and the Secretary of the Public Works Department, India Office) is appointed by the Secretary of State. The Selection Committee consider any applications which may have been made since the last recruitment, and are awaiting the occurrence of further vacancies, and further invite by special letter (*a*) the principal railway companies in the United Kingdom to make known the appointment to any suitable candidate with sufficient railway experience, and (*b*) the Appointments Committees of Oxford and Cambridge and any other University that may apply to be furnished with such notices to suggest suitable University candidates. When all the applications have been received every candidate who is qualified under the regulations and is not *primâ facie* quite unsuitable is invited to an interview with the Committee, who then make their selections. There is no rule as regards the relative proportions of men with railway experience and University men appointed, but the Committee are guided, in the absence of an expressed wish on the part of the Government of India, by the relative suitability of the candidates who present themselves.

(2) Recent Selection Committees have been constituted as follows:—

Sir H. S. Barnes, H.C.S.I., K.C.V.O., Chairman of the Public Works Committee of the Council of India. A Brereton, Esq., C.S.I., Government Director of Indian Railway Companies. H. A. Haines, Esq., Secretary, Public Works Department, India Office.	August 1911. August 1912. January 1913.
Sir James Thomson, K.C.S.I., Acting Chairman of Public Works Committee. A. Brereton, Esq., C.S.I. H. A. Haines, Esq.	August 1913.

(3) *Miscellaneous Public* ***Works Appointments.*** —The India Office is occasionally called upon **to** engage other persons for special appointments **in** Indian Service. These appointments are not made on the advice of a formally constituted Selection Committee. They are comparatively few, the rate of recruitment is low and irregular, and candidates with specialised or technical training are required. Thus within the last five years Consulting Architects have been engaged for the Governments of Bombay, Bengal, Eastern Bengal and Assam, Burma, and the United Provinces. **It** has been the practice to request the President of the Royal Institute of British Architects to nominate suitable candidates for these appointments. Assistant architects have also been engaged for several of the Local Governments in India, the selection of candidates being, at the request of the India Office, made by the President of the Architectural Association. There are also from time to time requests from India for the engagement **of** electrical engineers or other engineers with special qualifications. The method of filling such appointments depends on the circumstances of each case and a suggestion as to the method of recruitment not infrequently accompanies the demand. Public advertisement is made when necessary.

(4) Applications for special appointments of this kind are recorded in the Public **Works** Department **of** the India Office, and on occurrence of a vacancy for which the applicant is *primâ facie* suitable, care is taken to see that his application is considered along with those of other candidates. Appointments such as electrical inspectors, experts for supervising water-borings, plumbers, mechanics, foremen, electricians are occasionally made. The expert advisers consulted in such cases vary according to the nature of the appointments.

II. Supplementary note by Mr. Haines

81,483. **A** memorandum prepared in this Office regarding recruitment for the Public Services in India through the channel of the Public Works Department, India Office. has already been laid before the Royal Commission.* **I** now submit a Supplementary Note with annexures.

(2) The first. annexure is a Statement showing the number of appointments made through the Public Works Department of this Office to the superior establishments of the services of the Government of India since 1st January 1911, and the manner in which the selections were made.

(3) In regard to the appointment of Assistant Engineers. the following further observations may be made. The question of the qualifying degrees of candidates has been the subject of prolonged consideration. **I** attach (Annexure *II.*) a copy of Appendix **I.** of the Regulations in the revised form in which it has been approved by the Secretary of State in Council for appointments to be made in 1915.

(4) **In** paragraph 5 of the Regulations* for appointments of Assistant Engineers, **it** is laid down that not less than 10 per cent. of the appointments will be reserved for Indians. This rule had its origin in the time of Coopers Hill College. The College at that time admitted students to the number of about 50 a year; and about **12** engineering appointments were offered each year to the most successful students at the end **of** their course. The College was open to Indians as well as Europeans. The following rule was inserted in the College Prospectus for 1901 :—

"Natives of India who are British subjects have the exclusive right to enter the Public Works and Telegraph Departments through the Indian Engineering Colleges. They cannot claim, therefore, the right of admission to the Royal Indian Engineering College, which is maintained for the training of Europeans, with a view to compete for the appointments given to its students.

"Nevertheless, when there is spare accommodation, the President has discretionary power to admit natives of India who are British subjects, and two appointments in those services, but not more than two in the aggregate in each year, **may** be awarded to such students."

(5) When the College was closed in *1906,* the provision for the appointment of Indians to the Imperial Service of the Public Works Department was continued, and a rule was inserted in the Regulations to the effect that the total number of natives of India appointed in any year under these Regulations "shall not exceed *10* per cent. of the total number of Assistant Engineers thus recruited." This was changed in 1909, and the rule altered to provide that "Natives of India shall be selected to the extent of 10 per cent. of the total number of Assistant Engineers thus recruited, if duly qualified."
This rule ***is*** still in force.

(6) **It** may be added that the Reports of the Selection Committee show a continuous improvement in the standard of Indian candidates since the present system of selection came into force.

(7) With regard to the appointments of Architects and to most of the other Miscellaneous appointments shown in Annexure **I.,it** may be stated that the appointments are made in the first instance on short agreements for five or three years, but at the end of the first term, the services of the officers are generally retained on fresh conditions involving a higher salary These fresh conditions are recommended by the Government of India and approved, with or without modifications. hy **the** Secretary of State. There **are** no regulations on the subject.

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* *See* Memorandum above.

* *Vide* Appendix No. XXI in **Volume** XVI.

81,484. ANNEXURE I.

Public Works Department.

Appointments made to the Superior Establishments **of** *the* ***Services*** *of the Government* ***of*** *India since 1st January 1911.*

Appointments.	Year.	**Number** of Appointments made.	Salaries of Appointments.	By whom Candidates were selected,
(i) *Assistant Engineers* (Imperial Service) in the Public Works and State Railway Departments.	1911	23*	Commencing at *Re.* **380** a month.	Selection Committee appointed by the Secretary of State, consisting **of** Sir Hugh Barnes (Chairman of the Public Works Committee of the Council of India), Colonel Sir John Ottley (late President of Coopers Hill College), and Sir Alexander Binnie (representing the Institution of Civil Engineers).
	1912	20	Do.	
	1913	33	Do.	
(ii) ***Temporary*** *Engineer* for deep borings for artesian wells, Bombay.	1913	**1**	Rs. 700–800 a month.	Ingersoll Rand Company.

Appointments.	ear.	Number of Appointments made.	Salaries of Appointments.	By whom Candidates were selected.
(iii) *Assistant Electrical Engineer* for Oudh and Rohilkund Railway.	914	1	—	Selected by Consulting Engineer, but appointment actually made in India, the candidate having in the meantime proceeded to India on his own account.
(iv) *Assistant Signal Engineer* for Indian State Railways.	912	1	Bs. 350–25–400 a month.	Consulting Engineer to the Secretary of State for India.
(v) *Workshop Accountant* for Indian State Railways.	913	1	Rs. GOO–50–900 a month,	Mr. W. F. O'Donoghue, late Accountant-General and Secretary to the Government of India in the Public Works Department.
(vi) *Assistant Traffic Superintendents,* Indian State Railways.	911	5	Commencing at Rs. 350 or Rs. 400 a month.	Selection Committee appointed by the Secretary of State, consisting of the Chairman of the Public Works Committee of the Council of India, the Government Director of Indian Railway Companies, and the Secretary in the Public Works Department of the India Office.
	912	3	Do.	
	913	8	Do.	
	914	1	Do.	
(vii) *Assistant Locomotive and Carriage and Wagon Superintendent,* Indian State Railways.	911	6	Commencing at Ks. 300, 350, or 400 a month.	Consulting Engineer to the Secretary of State for India.
	912	4	Do.	
	913	7	Do.	
	914	4	DO.	
(viii) *Assistant Coal Superintendents,* Indian State Railways.	913	2	Rs. 450–50–600 a month.	Director-General of Stores in consultation with Consulting Engineer.
	914	1	Do.	H.M.'s Chief Inspector of Mines. Home Office.
(ix) *Assistant Laboratory Officer,* Indian State Railways.	913	1	Do.	Director-General of Stores in consultation with Consulting Engineer, and the Director of the National Physical Laboratory.
(x) *Assistant Chemist,* Indian State Railways.	913	1	Do.	Do. do.
(xi) *Electrical Inspectors* for Local Governments in India.	913	1 (Madras), 1 (United Provinces).	Rs. G00 a month. Rs. 700 a month.	Director-in-Chief, Indo-European Telegraph Department. Director-General of Stores in consultation with Mr. Goument, late Chief Engineer and Secretary to the Government of the United Provinces in the Public Works Department.
(xii) *Architects* :—				
(*a*) Consulting Architects	911	1 (Burma).	Rs. 800–50–1,000 a month.	President, Royal Institute of British Architects.
	912	1 (United Provinces).	Do.	Do. do.
	913	1 (Punjab).	Do.	Do. do.
(*b*) Assistant to Consulting Architect.	913	1 (India).	Rs. 600–40–800 a month.	Do. do.
(c) Assistant Architects.	912	4	Rs. 340–40–500 a month.	President of the Architectural Association.
	913	2	Do.	Do. do.
	914	2	Rs. 540–40–660 a month.	(1) President of the Royal Institute of British Architects, and (1) President of the Architectural Association.
(*d*) Architectural Draughtsman.	913	1	Rs. 500–50–600 a month.	Mr. E. L. Lutyens, Architect for New Delhi.

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* Made by the Judicial and Public Department.

81,485. ANNEXURE II.

Draft of Appendix I. for Public Works Department Regulations, 1915.

Lists of Degrees referred to in Paragraph 6.

The degrees shown in Lists **A** and **B** are accepted without reservation in the case of candidates who matriculated on or before **30th** June 1914. The special condition applicable to candidates who matriculated on or after 1st July 1914 are stated in the Notes appended to the two lists.

Candidates who reply on a degree in " Mechanical " or " Electrical " Engineering or in " Naval Architecture" should have had at least one year's practical experience in Civil Engineering.

List A.

Oxford.—B.A. (with Honours in the Engineering Science Final Honours School).

Cambridge.—B.A. (with Honours in Mechanical Science Tripos).

St. Andrews.—B.Sc. in Engineering.

Glasgow.—B.Sc. in Engineering.
Edinburgh.—B.Sc. in Engineering.
Dublin.—B.A.I. with Honours in Engineering.
London.—B.Sc. with Honours in "Civil and Mechanical" or "Electrical" Engineering.
Victoria University (Manchester) —B.Sc. with Honours in Engineering.
Birmingham.—B.Sc., with Honours in "Civil," "Mechanical," or "Electrical" Engineering.
Liverpool.—B.Eng, with Honours in "Civil," "Mechanical," or "Electrical" Engineering, or **Naval** Architecture.
Leeds.—B.Sc., with Honours in "Civil," "Mechanical," or "Electrical" Engineering:
Sheffield.—B.Eng., with Honours in "Civil," "Mechanical," or "Electrical" Engineering.

Note to List A.—In the case of candidates who matriculate after 30th June 1914 the above degrees will be accepted only if taken after three years' study in the several Universities, but this condition will not apply to Indians who, having taken an Indian degree which exempts them from part of the University course, shall have taken one of the above degrees in less than three years in accordance with the regulations of the University concerned.

List 3.

Dublin.—B.A.I.
Durham.—B.Sc. in "Civil," "Mechanical," or "Electrical" Engineering, or in Naval Architecture.
London.—B.Sc. (Engineering).
Victoria University (Manchester).—B.Sc. Tech. in "Mechanical" or "Electrical" Engineering (Honours Division in the Final Examination).
University of Wales.—B.Sc. (in "Civil," "Mechanical," or "Electrical" Engineering).
Birmingham.—B.Sc. (Engineering).
Liverpool.—B.Eng.
Leeds.—B.Sc. in "Civil" or "Mechanical" Engineering.
Sheffield.—B.Eng. (First Class in the Final Examination).
National University of Ireland.—B.E.
Bristol.—B.Sc. in "Civil" or "Mechanical" Engineering.

Note to List B.—In the case of candidates who matriculated after 30th June 1914 the degrees in List B will be accepted only if (1) the matriculation or other entrance examination accepted by the Institution of Civil Engineers to the Engineering course in the University has been passed, and (2) a regular course of study occupying not less than three academical years has been pursued in the University between the passing of such matriculation or other entrance examination and the passing of the final examination for the degree.

But Indians who have taken an Indian degree which exempts them from part of the University course will be regarded as having satisfied condition (1) and will be exempted from condition (2) if their degree has been obtained in less than three years in accordance with the Regulations of the University concerned.

81,486. ANNEXURE III

Note by Sir A. M. Rendel, dated 22nd April 1914, on his Procedure in Getting and Choosing Candidates.

I should premise that I am not concerned with the appointments to the Civil Engineering section of the P.W.D. but, as Mr. Haines says, I am referred to when men are wanted for the locomotive, carriage and wagon, electric, and other mechanical departments of Government railway management; and I, or rather my firm, are applied to by our other Indian clients for all descriptions of railway appointments of the mechanical class, and some others as well.

Our mode of action in obtaining the men indented for is advertisement in the Press. A paper containing questions as to age, nationality, education (general and professional), practical experience, &c., is then sent to all of the applicants who seem to require consideration. These papers and a personal interview with those whose answers promise well, form the basis of the final selection. In no case is there any favouritism in any way, except so far as this, that, *cæteris paribus*, we incline, with the full assent of our clients, to a preference to the sons or near connections of men who have done good service to the Government of India.

The number and quality of the applicants varies greatly, depending a great deal on the activity of railway construction in the world of British enterprise; but I am safe in saying that the higher values attached of late years to the theoretical education noticeable in all occupations is having its full effect on the civil engineer, who is now frequently able to show a diploma or degree—often with honours—from some University or first-class teaching authority, and as a matter of fact we are now able to almost confine our recommendations to men who can produce one. It is not so marked in the other branches of my profession, but it is to a great extent compensated for by a longer and more searching practical training, and by the opportunities offered by the evening schools maintained by many of the great English railway companies, of which many young men fully avail themselves.

31,485. ANNEXURE IV.*

(i) Return showing for the year 1911–13 the number of Indian applicants for appointment as Assistant Engineer, &c.

—	1911.	1912.	1913.	Total.
Number of qualified candidates	10	13	16	—
Number of appointments made	3	3	4	10

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* This Annexure was put in by Mr. Haines after his oral examination, *vide* paragraph 81,491.

(*ii*) *Provinces from which 10 Indians appointed as Assistant Engineers in 1911-12-13 came*:—

—	1911.	1912.	1913.	Total.
Punjab	1	2	4	7
Bombay	1	—	—	1
Burma	1	—	—	1
Hyderabad	—	1	—	1
	3	3	4	10

(*iii*) *Universities at which 10 Indian Assistant Engineers appointed in 1911-12-13 took their course*:—

—	1911.	1912.	1913.	Total.
London	1	1	3	6
Glasgow	—	1	1	2
Edinburgh	1	—	—	1
Manchester	—	1	—	1
No University	1	—	—	1
	3	3	4	10

51,458. ANNEXURE V.*

Statement showing (a) number of natives of India who have applied for appointment as Assistant Engineers in Indian service and (b) number of natives of India appointed in years 1905-1914.

Year.	Number of Indian Applicants.	Number of Indians qualified for appointment.	No. of Indians selected.
1905	No record	No hard and fast line was drawn in these years between "qualified" and "unqualified" candidates.	—
1906	1		—
1907	—		—
1908	8		—
1909	13	7	3
1910	16	7	3
1911	20	10	3
1912	16	13	3
1913	22	16	4
1914	31	21	3

* This annexure was put in by Mr. Haines after his oral Examination, *vide* paragraph 81,491.

81,489. ANNEXURE VI.*

Statement showing amount of professional experience possessed at the time of their selection by Assistant Engineers appointed during the years 1905-1914.

Year.	No. of appointments made.	No professional experience.	One year's experience or less.	More than one year's experience.
1905	25†	2	11	12
1906	14†	1	7	6
1907	17	—	6	11
1908	39	—	14	25
1909	30	—	5	25
1910	25	1	7	17
1911	23	—	—	23
1912	20	1	8	11
1913	33	—	13	20
1914‡	30	—	18	12

* This annexure was put in by Mr. Haines after his oral Examination, *vide* paragraph 81,491.

† In addition to appointments made from the Royal Indian Engineering College, Coopers Hill.

‡ No appointments have yet been made in 1914. The figures refer to the candidates selected for appointment and may require revision.

Mr. H. A. HAINES called and examined.

81,490. *(Chairman.)* The witness was Secretary of the Public Works Department of the India Office and a member of the Selection Committee for certain traffic appointments.

81,491. He put in a return* showing for the last three years the number of applicants for appointments who were non-Europeans, and he undertook to put in a further return showing the number of candidates selected for the Public Works Department and the Railway Department, and distinguishing those who had had no professional experience from those who had had a year's professional experience or more.*

81,492. *(Lord Ronaldshay.)* Under the present rule Indians had to be appointed to the extent of 10 per cent., but it was not meant definitely to limit them to that percentage, though, as a matter of fact, the 10 per cent. had not been exceeded. He was not able to say whether under the rule Indians had been appointed who would not have been appointed if the rule had not been in existence, but he knew, as a matter of fact, that three or four years ago it was felt that some Indian candidates, who were only just up to the standard of qualification, would not have stood a chance unless they had been appointed under the 10 per cent. rule.

81,493. *(Sir Theodore Morison.)* It was a fact that the first Selection Committee reported that they would not have selected those two or three Indian candidates but for the operation of the 10 per cent. rule, but he understood that Indians were now coming forward with better qualifications. The rules as to qualifications had been recently revised so as to conform with the rules observed by the Institution of Civil Engineers, but a special exception had been made so as to allow Indians possessing an Indian degree to come forward as candidates for the Public Works Department although their qualifications would not be up to the standard prescribed by the Institution of Civil Engineers.

81,494. *(Mr. Chaubal.)* The rule in force at Coopers Hill stipulated that the 10 per cent. should not be exceeded, but the wording of the rule was afterwards altered. He understood that the interpretation of the wording of the regulation as it stood would not prevent the appointment of more than 10 per cent., although more than 10 per cent. had not been appointed in the past. It was, however. an accident that there was not an additional Indian appointed last time. The original wording was, "shall not exceed 10 per cent.," and that was altered to, "be selected to the extent of 10 per cent.," but it had not been understood in the India Office that only 10 per cent. could be selected.

81,495. *(Mr. Sly.)* The number of European candidates in 1911 was 89, and the number of Indian candidates fully qualified 10, so that there were only 99 fully qualified candidates in 1911 for the Indian Public Works and State Railway Department. The figures given in his written statement represented the total number of applicants and not those who were interviewed. All candidates who were fully qualified under the rules were interviewed.

81,496. Sir Alexander Binnie was at one time a member of the Selection Committee, nominated by the Institution of Civil Engineers, but for the present year the Institution had nominated Mr. Elliott Cooper.

81,497. The Selection Committee, appointed by the Secretary of State to advise him in connection with the appointment of Assistant Traffic Superintendents, included the Government Director of Indian Railway Companies, who had fairly recent experience of railway management in India.

81,498. *(Mr. Macdonald.)* Some of the appointments were made on the advice of one individual; for instance, the appointments of Assistant Coal Superintendents were made on the advice of His Majesty's Chief Inspector of Mines. The Chief Inspector recommended and the Secretary of State accepted his nomination. He did not think these appointments were advertised in the papers, but the Chief Inspector circularised the managers of a great number of coal mines. The first appointment, in 1913, of an Electrical Inspector was made on the sole advice of the Director-in-Chief of the Indo-European Telegraph Company, who was in touch to some extent with the Electrical Inspector in the Stores Department. He believed that post was advertised, and the same remark applied to a good many of the positions alluded to in his written statement. The posts of architects were not advertised as the principal architectural institutions, with which all architects were in touch, were approached on the occurrence of a vacancy. There was no rule that certain vacancies carrying a certain salary must be advertised, and he did not think a universal rule would be possible, as some of the appointments were very special; for instance, a person had to be obtained who was experienced in deep boring, and for that purpose the Ingersoll-Rand Company had to be approached, this being practically the only firm which could supply a man with the special training required. He did not think there would be any harm in having a rule by which appointments would all be advertised.

81,499. *(Mr. Arthur Rahim.)* With regard to the Indians who had got in under the 10 per cent. rule, but who otherwise would not have had a chance, he explained that the standard they had reached barely qualified them for appointment. It was quite possible, on the other hand, that the rule excluded some Indians who were really good men. No applications were received from Indians for some of the special appointments mentioned in the written statement. Very few Indians had received a training fitting them for most of those positions. He believed one did apply for the position of Electrical Inspector, but it was the only application received from an Indian. There were some Indians who were training for electrical engineering in Great Britain, but he knew of none who were working in the locomotive and carriage and wagon workshops of British Railways.

81,500. He considered it was almost impossible to have a competitive examination for Assistant Engineers as so much depended on the candidate's practical experience and capability of working. Testimonials were required from engineers under whom they had been employed to show that they were fit for practical work. A competitive examination was possible in India as the candidates had been under observation for a long time and their fitness was known; but if an examination was held in England for public works appointments there would be very little to go upon as to the fitness of the candidates for their work. He did not think anyone would accept a theoretical examination as the best way of obtaining engineers for India.

81,501. In the three years 1911-13, as far as selected candidates were concerned, five Indian engineering students came from the London University, two from Glasgow University, one from Edinburgh, one from Manchester, and one from no university at all.

81,502. The paragraph in his written statement alluding to the reports of the Selection Committee as showing a continuous improvement in the standard of Indian candidates, referred to the year 1910.

81,503. *(Sir Valentine Chirol.)* He had had no experience of India, although he was born there.

81,504. There was no general rule, when an appointment was made on the advice of a single individual, to determine who that individual should be. Very often the Government of India themselves suggested someone, and, as a matter of fact, did suggest the Inspector of the Home Office as a suitable person to advise, but if the suggestion had not come from the Government of India, it was very possible that the India, Office would have written to the Home Office asking whom they would recommend. The head of the department would probably make enquiries as to the most suitable manner in which the selection should be made and then submit his proposals to the Secretary of State. When a special recommendation was made by the Government of India, that recommendation was not acted upon automatically but was dealt with on its merits by the Secretary of State in Council. As a matter of fact, in practice a recommendation of that sort from the Government of India would very rarely, if ever, be ignored.

(The witness withdrew.)

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* **Vide** annexures **IV, V and** VI to written statement.

At the India Office, London, Wednesday, 6th May, 1914.

PRESENT :

THE RIGHT HON. THE LORD ISLINGTON, G.C.M.G., D.S.O. (*Chairman*).

THE EARL OF RONALDSHAY, M.P.
SIR MURRAY HAMMICK, K.C.S.I., C.I.E.
SIR THEODORE MORISON, K.C.I.E.
SIR VALENTINE CHIROL.
MAHADEV BHASKAR CHAUBAL, ESQ., C.S.I.
ABDUR RAHIM, ESQ.
FRANK GEORGE SLY, ESQ., C.S.I.
HERBERT ALBERT LAURENS FISHER, ESQ.
JAMES RAMSAY MACDONALD, ESQ., M.P.

M. S. D. BUTLER, ESQ., C.V.O., C.I.E. } *Joint Secretaries.*
R. R. SCOTT, ESQ. }

Colonel Sir JOHN W. OTTLEY, K.C.I.E., late R.E., M.INST.C.E., late Indian Public Works Department, and late President Royal Indian Engineering College, Coopers Hill.

Written Statement.

81,505. I gather that the special reason that prompted the suggestion that I should give evidence before the Royal Commission is that for the last 14 years I have had peculiar opportunities—first as President of the Royal Indian Engineering College, Coopers Hill, and then as a member of the Selection Committee—of forming an opinion as to the quality of the assistant engineers appointed during that period. Quite apart, from this, their are other reasons that, I think, qualify me to express an opinion on the subject of the recruitment of the Public Works Department.

81,506. I commenced my professional career as a civil engineer in India as far back as 1858, when I was articled to the chief engineer of the Great Indian Peninsula Railway in Bombay. Consequently my personal acquaintance with India is a fairly lengthy one, whilst I have been connected with it by family ties for nearly a century, my father (an infantry officer in the H.E.I.C.'s service) having acted as an assistant engineer in the Bombay Presidency, where I was born in 1841. As a matter of fact I have been myself more or less closely connected with the Public Works Department for more than 45 years, and during that time have been associated with a great number of engineers drawn from a variety of sources, whilst many Coopers Hill men have served in India under my orders since the College was first established. Lastly, I was employed for some five months in 1894 as a member of the "Lyall Committee" which was constituted to deal with the question of the re-organisation of the Military Works and Public Works Departments, so that 20 years ago I had to make a special study of this question of recruitment.

81,507. From the wording of a communication received from the India Office, in which I am credited with possessing a "unique experience of the *quality* of the candidates who have for many years past obtained appointments in the Railway and Public Works Departments," I am not quite sure whether it is intended that I should institute a comparison between the assistant engineers from Coopers Hill and those obtained under the selection system. But in case this should be the intention, I will endeavour to explain as briefly as possible why it is really not in my power to frame any such comparison as would be of practical value. Indeed, in my judgment, the, only persons in a position to form any reliable opinion on this subject must necessarily be those under whom both classes have served on actual work for some considerable length of time. I may add, however, that I take leave to doubt whether any comparison of this sort would now serve any useful purpose. It seems to me that the points of real interest to-day are—(i) how far the existing system gives us the requisite material for India; and (ii) what (if any) changes are desirable to further improve that material and bring it up to the standard required.

81,508. In the first place, it is absolutely essential to arrive at a clear understanding of what is connoted by the word "quality." I should be disposed to say that it includes qualifications under the following three distinct heads:—

(i) The technical education of a civil engineer as tested by a University diploma or equivalent examination;

(ii) The possession of knowledge of many technical matters either peculiar to or especially required in India, for instance, plane table surveying, the methods of taking discharges, the preparation of materials, Indian building construction, the accounts and rules of the Public Works Department, the methods of executing work in India, and some general knowledge of the country, its inhabitants, its geology, &c.; and

(iii) The possession of qualities that cannot be tested by any examination, but which are really far more important than any amount of technical knowledge; I mean, for instance, a high moral standard, commonsense, good temper, a sense of justice, discipline, powers of observation and initiative, and readiness to accept responsibility.

81,509. Now, under the first head I do not think that there is a pin to choose between the *best men* appointed from Coopers Hill and the *best men* obtained under the present system. In either case, however, the term "best men" under this head only covers a comparatively small percentage of the total number of candidates. As regards the balance, I am distinctly of opinion that—taking *this test* alone—the *average* product of the selection system compares favourably with the average Coopers Hill student. This is only what might have been expected as only men up to the diploma, standard appear before the Committee.

81,510. Before passing on. I think it desirable to invite attention to a fact which, it seems to me, is often lost sight of, viz.:—that it is quite unnecessary that the whole or even a large proportion of the recruits should hold very high academic distinctions. I think all experience goes to show that it is by no means those who possess the greatest amount of "book learning" who turn out to be the most valuable officers. Of course, it is desirable that a certain number should be thus distinguished, but it should at the same time be borne in mind that the vast mass of the work to be done does not require these qualifications and that to employ a "1st class Honours" man for years together in carrying out the ordinary work of the Public Works Department is very much on a par with using a razor to chop wood blocks with, and very often results in completely spoiling both the instrument and the work. In short, for the ordinary work of the Department, the qualities outlined in head (iii) above are really of far greater importance than any amount of high technical and mathematical knowledge.

81,511. Turning now to the 2nd head (ii above) I would explain that every Coopers Hill student acquired more or less knowledge of these special matters whereas the recruits obtained under the selection system are necessarily almost invariably ignorant of them. It is, of course, quite true that this knowledge can be gradually picked up at a later stage after reaching India, but the broad fact remains that—*under this* head—the assistant engineers appointed from Coopers Hill were better fitted *on joining* to carry out the duties required of them than are the men now being sent out under the selection system.

81,512. It is, however, under the third head, *the possession* of *qualities that cannot possibly be tested* **by** *any form* **of** *examination,* that the difficulty of forming any reliable comparison becomes positively insuperable. **At** Coopers Hill the students were under my close observation both at work and play for three years, and I was, therefore, in a position to frame a fairly accurate estimate of what they really were. During the course I was able to weed out a certain number of undesirables, whilst in many cases the rough diamonds entering the College were cut and polished **out of** all recognition when they left Coopers Hill. **A** high moral tone and strict discipline was insisted on and a strong *esprit-de-corps* was fostered, which undoubtedly made for good results subsequently. I felt, therefore, fairly certain that, at any rate, a large proportion of those completing their course would develop into really good officers. Under the selection system, on the other hand, we know little or nothing of the candidates under this head, and the result is consequently very much a matter of chance. **It** is only possible to form a crude guess at these matters from a perusal of the letters of recommendation sent in and a short ten minutes' interview with each candidate. I have absolutely no doubt whatever that under the new system we have been able to nominate a very fair number of exceedingly good recruits, but I should hesitate to speak with any confidence as to others who may or may not eventually be found to possess the qualities essential to the making of a good and reliable officer.

81,513 So much was I impressed with these facts and also with the want of knowledge of the special technical matters referred to above, that after the closure of Coopers Hill College, but prior to the sale of the property, I suggested to the then Permanent, Under Secretary that an ideal system would probably be to select the men as at present and to then send them for a year or two to Coopers Hill for instruction in the matters referred to, thus also affording some opportunity of ascertaining what the men really were as opposed to merely what they knew. **It** seemed to me that in this way it might also be possible to secure some continuity of the *esprit-de-corps* to which **I** attached considerable importance, and which **I** thought it desirable to preserve for the benefit of the service. My proposal was, however, considered to be outside the range of practical politics, and was, therefore, dropped.

81,514. From what has been said above, it will, I hope, have been made clear why it is impossible for me in the circumstances to formulate any comparison between the products of the two systems with which I have been so long connected.

81,515. I have already said that in my judgment the really important points for present consideration are as to whether the present system affords the requisite material and whether any further change can be recommended. I propose in the following paras. to deal separately with the question of the selection respectively of European and native assistant engineers.

81,516. As regards *European assistant engineers,* I am unable, as matters stand, to suggest any better plan than that which now obtains, except that I should not be disposed to lay much, if any, stress on the supposed necessity for practical training in this country, and would strongly recommend that every man selected should be sent out *on probation* for three years, by which time the authorities in India ought to be able to decide whether he is worth retention or not. **It** seems to me that no man worth having need fear this test, whilst if any undesirable should be eliminated it would certainly be to the advantage of the service and of India generally. **It** should, of course, be provided that any man thus sent back at any time during his period of probation should be provided with his passage back, as also his salary to date of landing in England, unless he be dismised for some serious fault beyond mere unsuitability for the service.

81,517. Turning now to the class of *native assistant engineers,* **I** must record my matured conviction that it is radically wrong to make these appointments in England. I originally formed this opinion at Coopers Hill, where we had quite a number of native students, and the view then formed has been strengthened each succeeding year. **It** is an opinion, moreover, fully shared by every officer—both of the Public Works Department and the Indian Civil Service—with whom I have discussed the question, and also by natives themselves, both parents and candidates. **I** hold that it is absolutely wrong on principle to induce young Indians to come to this country on the mere chance of securing a valuable prize. Whilst Coopers Hill lasted, the evils were greatly minimised because, if a candidate failed at the entrance examination, he had at any rate lost comparatively little money or time, whilst if he succeeded in entering the college he had a fair chance of an appointment, and was, moreover, well looked after during his stay in England. Under the selection system on the other hand, the candidate is compelled to reside in this country for some three or four years at an expenditure running into many thousands of rupees, with, in many cases, no one to **look** after and care for him. At the end **of** his studies he has about a one in ten chance of being selected, as there are only some two or three appointments annually available for some **20** or **30** applicants. The vast majority must, therefore, return to India without a Government appointment, **and** with very little hope of obtaining any other employment. Can it therefore be wondered at that all these unfortunates go back to India thoroughly disappointed, disheartened and dissatisfied, and full of resentment at a system which has led to their incurring such heavy losses? **It** may not be out of place here to point out that some at any rate, and I think an increasing number of these candidates are the sons of subordinates in the Public Works Department, Supervisors and Overseers, drawing comparatively small pay, who can certainly ill afford to **risk** the loss of so large a sum as, say, **£1,000** and who certainly ought not to be tempted to incur that risk.

81,318. I have endeavoured to show above that the system is wholly wrong whether we regard it from the point of view of the parent or the candidate. **It** is equally unwise from that of Government, as the Committee have absolutely no knowledge of the candidates, and it is far less easy to be sure that the most suitable men are chosen from amongst the native candidates than is the case with the Europeans, and this, as already pointed out, is by no means a simple problem. Quite apart from this, there is the further difficulty that **a man** so chosen in London is as likely as not to be posted to any province but his own, and in that event will be quite as much a " pardesi " or " foreigner " as any European, having to learn a new language, and being out of touch with everything and everybody. On the one hand he will not have the prestige of the European, nor the support, sympathy, and social amenities of the people of the country. In short, he will be in all probability a veritable Ishmael with every man's hand against him.

81,519. The only possible remedy appears to me to be that native assistant engineers should be appointed in India on the recommendation of local Governments and administrations who should be required to employ the men so recommended in their own territories. In my judgment there is absolutely no necessity for insisting in their case on a course of training in this country; indeed, I am inclined to think that more useful men from the departmental standard could be secured from the Indian colleges.

81.520. So long as native assistant engineers are appointed in this country under the existing system, so long will it be necessary to appoint them on exactly the same pay and conditions as the Europeans appointed at the same time, and it was on the assumption that the Secretary of State might consider it necessary to adhere to these grants that I suggested some 15 months ago that the Government of India should **be** permitted to allot the small number of appointments thus available *as* special prizes to the various engineering colleges to be awarded to men of the different provinces in turn. I desire, however, to record my opinion that there is really no justification for offering to natives of India the salaries that are held to be necessary to secure the right stamp of European for the Indian service. I base this opinion solely on the fact, which **I** do not think anyone would care to deny, that the necessary expenses of a European Engineer in India are vastly greater than those of a native doing precisely the same work, so that the salary on which a European manages to live decently is really a splendid salary to a native, who probably is able to save three-fourths of it. To make this quite clear, **I** would point out that the salary that our young assistant engineers could hope to draw in England would certainly not be in excess of £100 to £150 a year, whilst many of them would be glad to get £50 a year. In order to induce these young men to take service in India, it is thought proper to offer them a commencing salary of Rs. 4,560, or, say, £300 a year, and we offer the same salary to young natives, some of whose parents, to my knowledge, cannot be drawing half that amount after, perhaps 30 or 40 years' service. **I** mould invite attention to the fact that the present system of paying native assistant engineers recruited in England far higher salaries than those paid to their countrymen appointed from the Indian colleges, who are performing precisely similar work, must necessarily cause great heart-burning, and will, I believe, lead to trouble hereafter. **It** is also unfair to the finances of India that more pay than is warranted is disbursed to the men in question.

81.521. It appears to me that the justification for the employment of Europeans is the belief that they render more efficient service, whilst their salaries have been fixed on the ground that they cannot be obtained for less money. As soon as **it** can be shown that the work can be performed equally well by native and therefore cheaper agency, the latter may be expected to replace the European much to the advantage of the finances of the country. **It** is obvious, however, that nothing is to be gained by unnecessarily levelling-up the salaries of the men of the country.

81,522. **It** may not, perhaps, be out of place if **I** add, in conclusion, that no matter how good the system of recruitment may be, full value will never be obtained unless care is taken to see that all promotions are made on the score of merit alone and not on the ground of mere seniority. The man who appears to be best fitted for any special work or post should Be selected for that work or post without regard being paid as to how he entrred the service, or whether he has or has not followed the regular course of promotion. On the other hand, inefficiency—from whatever cause it may arise—should be dealt with far more drastically than was often the case during my service in India

Colonel Sir JOHN **OTTLEY**, called and examined

81,523. (*Chairman.*) The witness was President of Coopers Hill from 1899 to 1906, and was now a member of the Selection Committee for the Public Works Department and the Engineering branch of the Railway *Department*

81,524. The selection of nien for engineering appointments was made on a variety of qualifications, but as he hail said in his written statement, **it** was quite unnecessary that the whole or even a large proportion of the recruits should hold very high academic distinctions. Every assistant engineer ought to have a certain amount of technical training, but he should not attach particular importance to First-class Honours There had been a tendency rather to look upon **a** man who had taken First-class Honours as necessarily a very much better man than a man who had simply taken a pass degree, but his experience had shown him that in very many cases the honours man was more or less of a bookworm and often not quite so good at practical work. In selecting candidates he accepted any pass degree as a suitable qualification. If a man was undoubtedly better in other respects, he attached **a** certain amount of importance to an Honours Degree, as **it** showed that he was a good man all round. but he would not pit an Honours Degree against other qualifications.

81,525 On the whole he thought the Coopers Hill training, all round, was better than anything in existence now. Comparing the present system of selection with pure examination, he thought the system of selection was the better of the two, because a great many men who were good on paper in an examination utterly failed afterwards. Some of the very best men in India had been Stanley men, but some very poor specimens had got in by passing an examination. Therefore, he preferred a system of selection of the kind that was now in force. **Fairly** accurate information was obtained with regard to character and disposition, but he was not altogether satisfied in this respect. For instance, questions were put such as: "Do you consider that the candidate is likely to he able to work satisfactorily with natives of India?" "Is he suited for the business of the Government of India in this Department?" and these questions went to people who knew nothing whatever about India or Indians or the department, and invariably the reply was "Certainly," and such opinions were absolutely worthless. There seemed to be no remedy for that, but he had recently suggested that the questions might be re-cast. The best remedy he could suggest would be a definite probation **of** three years, and if a man was good he had nothing to fear. **If** he was not a good man the sooner he left the Service the better. **HP** did not think such a rule would keep a man ont of the Service as there was such enormous competition in England at the present moment in the engineering branch that there would be no difficulty in obtaining men. He regarded probation as essential

81,526. On the Selection Committee there was no one with any recent experience of India, but the constitution of the Committee mas a matter for the decision of the Secretary of State. **It** would probably assist the Committee in their work if a senior officer of the Service was on it, but it would be necessary to be very careful in selecting the officer.

81,527. Plane table surveying was taught in some of the engineering colleges, but he had had many candidates before him who had never used a plane table and knew nothing at all about river discharges.

81,528. There was one matter which was really very important for India. **A** young engineer went out to the country and found he had to do everything from the start. **If** he had to build, he had to find in many cases his brick-earth and had to make bricks, learn to burn lime. and do many things which were quite new to him. In England he mould go to a contractor **and** buy *everything ready* made, but in India he had the preparation of the materials as well as the building. That was **a** thing that was taught at Coopers Hill as far as possible, but nothing of the kind was now taught in any of the colleges. At present the training. in the colleges was more or less a mathematical training and not a practical training. That training had to be picked up gradually, and could hardly be picked up anywhere else than in India, but students might be given in the course of their training some foundation on which to work.

81,529 He would like to see Indians recruited to the service in India. He objected to sending Indians to England to be trained, because he thought it was a very cruel thing to do. He would have Indian officers in future appointed by selection in India, and even where there was an Indian who had been trained in England—and he did not think any Indian should be trained in England—the Secretary of State should send out particulars *to* India. and the selection should be made in that country.

81,530. With regard to the observation in the written statement, that at he end of his studies the Indian assistant engineer had about a one in ten chance of being selected, as there were only some two or three appointments annually available for some **20** or 30 applicants, he did not mean that there mas a considerable number of Indians in England who were qualified to occupy positions as assistant engineers. They had their diplomas, but he did not think they had the other qualities, and there was no means of testing them. In many cases they were not the right stamp of men for the engineering profession. On the last occasion there were about **30** Indian candidates who had gone through courses in England, costing their parents from Rs. 12,000 to Rs. 15,000, money which might have been borrowed. Yet there could not possibly be more than one in ten who could get an appointment under the present system. **He** believed that **21** out of the **31** applicants had diplomas. They were **all** at the colleges, but some had not qualified, and there were only three appointments for the 21 candidates who actually held diplomas.

81,531. A diploma was no test of whether a man was fitted to be an engineer or not. There were points of character infinitely more important than any amount of technical education. On the technical side he did not consider that the diploma represented a sufficient qualification for the ordinary work of the Public Works Department. He would rather insist on practical experience than on technical training if it was necessary to choose between the two. Of course, for certain purposes it was necessary that a man should have high mathematical qualifications, hut for the ordinary work of the Department such qualifications were absolutely not required.

81,532. It had been the rule of the selection committee to give preference to men who had had a year or more of practical experience. He was very doubtful about this so-called practical experience, because it was really not practical experience. A man would come forward and say he had been engaged on such-and-such works, and would give a list which would lead one to suppose that he had been actually engaged on the works, but when cross-examined on the subject. it would be found that he had simply been to look at them. There were many cases where men had actually been employed and were good enough to be paid for their work, but in a very large number of cases that was not the case, the so-called practical experience simply amounting to the preparation of tracings in the drawing office. The difficulty was that a man who was going out to India paid a premium of 50 to 100 guineas for a year's training, and the people in charge of the works naturally had very little interest in him; they pocketed the premium and did very little in the way of teaching. In the case of Englishmen they often did not charge a premium at all, but took a lot of trouble with them, and during the second or third years they got their money back by making them useful. The men for India were simply lookers-on. A man might have been employed for only six months on works, but if his employer had found him valuable enough to pay for his services, that showed that he was useful. Hitherto the idea had been general that unless a man had a year's practical experience he would not be accepted, but he had had very largely to discard that idea, and therefore he was thrown back on the theoretical qualifications, the candidate's recommendations, and the answers the man himself gave during his 10 minutes interview. It would be a good thing to have more than a 10 minutes interview, but it was quite possible in many cases after that time to say that a man was suitable. The rule guiding him was to put himself into the place of an employer and ask himself whether he would take the man on.

81,533. The material for selection was nothing like so strong as it looked on paper. There were a great many men who could be thrown out almost at sight. He was not opposed to examination after selection. Better practical experience could be obtained by probation in India, and after a man was selected he should go straight out to India to gain that experience, and it would be quite possible to say after three years in India whether the man was fit to be retained or not..

81,534. (*Sir Murray Hammick.*) It was possible that, owing to the frequent change of superior officers, it might be difficult in two or three years to tell what the real value of a probationer was. No doubt it would be a difficult thing for a superior officer in the Public Works Department to make a selection in India after a three years' trial, and the chances were that unless the man was very bad he would remain in the Department, but the authorities in India would at any rate have had the opportunity of finding out whether a man was or was not suitable, and this would be an improvement on the present system.

81.535. With regard to the colleges in England to which Indians went for training, it could not be said that there was any special college. Of those that appeared before the Committee this year five came from Edinburgh, four each from University College and the City and Guilds Institute, three from Glasgow and one each from Armetrong College, King's College, Cambridge, Manchester, and Liverpool.

81,636. When he found that the training had been really practical he placed great value upon it; in other cases the value he attached to it was very small.

61,537. (*Sir Valentine Chirol.*) He did not think that there was any need for a redistribution of the work done by members of the Public Works Department when they, got out to India. Young engineers, whether assistants or executives, in the majority of cases did not require high mathematical qualifications. What he had in his mind was the fact that a good many men of very high qualifications had proved absolutely useless in practical work. He knew many men of his own time, Royal Engineers, Stanley engineers and Coopers Hill men, who were head and shoulders, from the mathematical point of view, above their compeers and yet were absolutely useless for practical work. That seemed rather to show that much of the work which engineers were put to when they first reached India was not the work on account of which they were recruited; they were chosen to do a very much higher class of work and when they got to India they were put to work of a very different character, and when the time came for them to take on first-class mathematical work they had lost to some extent the power of doing it.. He did not think that could be remedied by any redistribution of the work done by the Department in India, because not only high mathematical qualifications in certain instances were required but experience to use those qualifications, and that could be only obtained on work. The young engineer might be used as an assistant to an officer on a big design, but at first he could only carry out the orders of somebody else. He was afraid it was impossible to relieve the engineer of the prolonged burden of so-called inferior work during the first few years, because there were very few higher posts, and they required experience, and in the meantime all the work of the Department had to be done by people who could do it with very much lower qualifications. The ordinary work which had to be done by the Department was very humdrum work indeed, such as road maintenance and construction and survey work.

81,638. (*Mr. Abdur Rahim.*) He was not inclined to say that the education of an engineer in England was higher than it was possible to get in India, and so far as the engineering service was concerned it would be possible to recruit from Indian engineering colleges. He did not see any reason why it was necessary to recruit Indians from England at all. The European could not be recruited in India, and he had never come across an Indian who was the equal of the English engineer on the work. He did not say that the Indian engineer could do the work expected of him; what he said was that the education in the Indian colleges was as good as that in the English, but, as he had said over and over again, the education was a very minor consideration. There was no question of race involved. As soon as Indian engineers could be got to do the work as well as Europeans, then by all means they should be employed. Since 1903 Indian engineers had been sent out, and it was for India to say whether they had done their work to the satisfaction of the authorities in India. He was not in a position to say whether Indian engineers trained in Indian colleges did their work as well as Indian engineers trained in English colleges. The only persons capable of giving an opinion on this point must be those on the spot who could make the comparison.

81,539. With regard to the statement in his memorandum that "In order to induce the young men to take service in India, it is thought proper to offer them a commencing salary of Rs. 4,660, and we offer the same salary to young Indians, some of whose parents, to my knowledge, cannot be drawing half that amount after 30 or 40 years' service," he did not mean by that that the young Indian engineer was not to be paid a salary larger than his father had been getting, but he did not think he was the class of man to be put in a position of control over a large number of people, and, therefore, he was not **a** man to be an assistant engineer. That was not necessarily because his father had been in a subordinate service. When he wrote that paragraph he had in his mind that it was not **a** satisfactory thing for a man in tho position of a subordinate to spend an enormous amount of money on sending his son home to England merely on the chance of getting double the pay that his father was drawing at the end of 30 or **40** years' service. It was not intended in any way to he an offensive statement.

81,540. There had been no Indian member on the Selection Committee.

81,541. (*Mr. Fisher.)* The number of officers recruited each year varied. In 1912 there were only 19 whilst in 1913 there were 33 vacancies. Some years ago there were as many as 234 applicants for about 30 vacancies, but at present there were about 130 applicants for the same number of vacancies, the number of applicants being on the decline. It was difficult to say what that decrease was due to.*

81,542. The Selection Committee did not inake a point of approaching the different engineering schools, and it might be **a** good plan to send round to each of the colleges in order to get some information about the men on the spot. He did not think it would be practicable to give to each of the principal engineering colleges in England a certain number of places and put the responsibility upon the heads of those colleges to recommend candidates, at the same time asking the colleges to undertake to give instruction in those particular branches of engineering knowledge which were directly applicable to India, such as used to be given at Coopers Hill. One year a large number might come up from one particular college, and in the following year there might not be a single man from that college. The principals were asked to place the men as far as possible in order of merit, but it was very rarely that the Selection Committee took precisely the same view as the principals in regard to the relative merits of candidates.

81,643. If an Indian showed any special bent in any particular direction, it might possibly be useful to bring him over to England for further training. That was reverting to what took place some 40 years ago, when two assistant engineers were sent over for special training. He would not lay down any definite number to be sent over each pear, but leave that to be fixed as men were found to be available.

81,544. It was quite true that while the Indian engineering colleges could give **a** training in civil engineering as good as could be obtained in England, they might be behind English colleges in mechanical engineering and electrical engineering, but he was not dealing with either of those branches, but simply with civil engineering, such engineering **as** would be taught at Sibpur College and the Thomason College. For **all** purposes of the Public Works Department, he thought those Indian colleges gave **a** better education than was given in England, or certainly as good.

81,545. (*Mr.* Sly.) The Selection Committee were responsible for the selection of engineers required for Indian railways as well as for the Public Works Department, and as far as possible every man selected for a railway appointment had at least one year's training on a large railway in England, and he believed that in the present year every man had had considerably more, some having two or three years' experience. It would be a good thing if that was made a definite condition of recruitment to the railway service. It was no use sending a man on to **a** railway unless constructional work was going on. It was difficult to secure facilities in England for candidates, but it should be made somebody's business to see that it was done.

81.346 The Indian Public Works Department compared very favourably with other openings for young engineers in point of attractiveness. It was largely a question of money. At present the Indian Public Works Department attracted a really good standard of engineering students.

81,547. With regard to the 10 per cent rule, it was laid down that the committee had to select at least 10 per cent. of Indians, and he knew of no rule which permitted more than 10 per cent. to be selected if qualified candidates were available. The standard of Indian candidates had varied considerably. In the early days the committee had selected three Indians and had reported that had they been Europeans not one of them would have been chosen, but since then the standard had so improved that, so far as technical qualifications were concerned, many men could have been selected had the 10 per cent. rule not been in force and it became increasingly difficult to select the best two or three men. In saying this, he was merely comparing Indians with Indians and not with Europeans. There were certain specific degrees of engineering colleges which were accepted as qualifications, amongst them the qualifications of the Institution of Civil Engineers. Some of the qualifications were very likely to be considerably altered. **A** Past President of the Institution of **Civil** Engineers sat on the last Selection Committee and had taken note of several of the cases. In the case for instance of one of the colleges it was said that the degree was accepted with advanced mathematics, but when he came to cross-examine on the matter he found there was no examination in mathematics at all, and that the student had merely attended certain mathematical lectures; whether he had benefited from them at all there was nothing to show.

81.318. He doubted very much whether a great deal of work which formerly used to be done by assistant engineers had now been transferred to the Provincial Service and that assistant engineers had now to discharge much higher duties than used to the case.

81.549. *(Lord Ronaldshay.)* The Selection Committee had nothing to do with telegraph engineers. He had been told that mechanical engineering and electrical engineering were better taught in this country than in India, but he had no knowledge on the subject.

(The witness withdrew).

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* The witness subseqnently wrote:—It is probably due to the fact that the conditions of selection are now better understood by applicants, because it appeared that **of** the 234 candidates who applied in **1909 only** 103 came before the Committee, the remainder having been ruled out **as** *not* fulfilling all the conditions laid down. On the other hand, out of the **136** candidates applying in **1914**, no less than 91 came before the Committee. It wonld, therefore, seem that the number of qnalified candidates has not really diminished to any serious extent.

A. BRERETON, ESQ.,* C.S.I., called and examined.

81,350. (*Chairman.*) The witness had been on the Selection Committee for the appointment of Assistant Traffic Superintendents and had been *a* Government Director of Company Railways. He had just joined the Board of Directors of an Indian railway.

81,551. There was very little difference in the method of recruitment to Government railways and company railways in India; so little, indeed, that as Government Director he used to give the company **a** list of candidates who came up for Government service and were not selected, and those candidates were very often appointed by the companies. The companies advertised when they required any number **of** men, or went to their consulting engineers. There was very little difference in the class of men employed on government or company railways in India.

81,552. About the same number of Indians were employed as engineers and traffic officers on company lines *as* on the State railways, only they were engaged in India. The companies considered it an essential condition that Indians should not be recruited in England because better Indians could be obtained in India. To appoint young Indians in England was very hard on those Indians who had put in long service in India and were waiting for *a* higher appointment, and the companies preferred to select old servants for the better appointments.

81,553. **A** fair number of Indians applied in England, but not many engineers. Quite recently four Indians had been appointed to the companies' railways by selection in England, and their qualifications were about equal to those of the other candidates who came up. Where they were manifestly superior Indians would be selected, but where there was no more than equality the preference was given to Europeans, because Indians of equally good quality could be obtained in India. The training in India **for** Indian engineers was quite as good as was necessary; they were not all required to be scientific men, as there was *a* good deal of drudgery to be done that could be done by less highly educated men. The engineering training required for practical railway men could be given in India *as* well *as* in England. Many Indians spent **a** lot of money in going to England and qualifying without securing an appointment; if they had spent half the money in India they would have been more likely to have obtained *a* position.'

81,554. The question whether European engineers appointed to the railways should have professional experience as well *as* technical training before going out to India depended upon the age of recruitment. He did not think it had been shown that professional experience gave **a** candidate going out to India any particular advantage. For instance, Cooper's Hill men were given one year's practical training for *a* certain number of years, but that was abolished, and men subsequently went out without practical training, and there had been little or no difference between the two classes. In selecting from 20 engineers whose qualifications were up to the standard, the Selection Committee would probably prefer to take the man who had had practical experience. but this would not he the case always, as it might be possible to get *a* better man who had not had practical experience. The companies had no particular standard, and they might take **a** fancy to **a** man who had had no practical experience, and he would probably do better than another man with practical experience. There should be **a** good deal of elasticity.

81,555. The present system of qualification for assistant traffic superintendents was good; the men were obtained from almost every source, from promoted station masters up to university men. All the men had not **a** university qualification, the university qualification being simplr taken as a standard of education, the candidate entering the business as he would enter *a* merchant's office. If he had the capacity for learning he would learn all right. Many of them started with too high an education, and could not get through the drudgery of the profession and dropped out. Some university men had done very well. Perhaps the mistake was made in restricting the area of selection by insisting on too high qualifications, but the actual standard was fixed by the candidates themselves; if there were 10 vacancies and 50 men came up, the best of the 50 were taken. He would suggest that on the Committee there should be one man with some traffic experience, who could put questions to the railway-trained men to see whether they knew the business they had been engaged in. Up to the present he had represented that particular element on the Committee. There had been always someone conversant with the conditions in India and his successor on the Committee would bring in recent experience.

81,556. (*Sir Theodore Morison.*) He did not see why there should be more confidence in the system of selection if the Committee included *a* person not connected with the India Office or Indian administration. There was always *a* certain amount of jealousy in India when appointments were made, as the Indian officers often wished to make their own appointments, but he could not see how any want of confidence could arise, and he had never heard any expression of want of confidence in the selections made. As far *as* he could recollect, it was rather the other way.

81,557. (*Mr. Chaubal.*) There were not many Indian engineers in the Railway Service. One cause for that was that Indians coming to England expected to be appointed in England on their merits, whereas if they sought appointments in India probably more would be taken on. There were many Indians employed on the State railways in the Engineering Department; there was a regular recruitment from Roorki. They were generally employed on constructional work, not many being engaged on the open line. On the open lines, where they had to deal with Europeans, there were one or two natives who had done very well indeed. An Indian was now Chief Engineer of the Eastern Bengal Railway. This officer had worked himself up from the lowest grade. He thought more Indians would be appointed in the course of a few years.

81,558. (*Mr. Sly.*) The improvements made in the prospects of the traffic branches of Indian railways in 1911 had not improved the quality of candidates to any great extent. The Traffic Department was not a profession requiring *a* definite standard of qualification, such *as* the engineers; almost every class of man was taken into the Traffic Department, even boys who had entered on traffic work in England at the age of **14** and worked for five or six years, and boys in India just from school. The change made in 1911 attracted the university man, but it had made very little difference in the quality of the men whom they obtained from the railways, except that *a* better class of man was entering the English Railway Service.

81,559–82,543. (*Mr. Fisher.*) The recruitment to the Traffic Department fluctuated very much. The largest number that had been recruited was 10, and in one year there was none at all; the average would be about **5** or 6. The number of candidates had been as high *as* **40,** a large number of whom were university men who had gone up for the Civil Service and had failed. The quality of the men in the Traffic Department had distinctly improved, but at the same time the lower grade men who had worked on **a** railway were not excluded. The Committee was in personal touch with the Secretaries of the various Appointments Boards of the universities.

(The witness withdrew.)

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* This witness **did** not submit a written statement.

LIST OF APPENDICES.

I. Regulations for appointment in England to the Traffic Department.
II. Rules for the recruitment in India of the Superior Traffic Department of State Railways.
III. Regulations for appointment to the Locomotive and Carriage and Wagon Departments.
IV. Supplementary Memorandum by Mr. T. Ryan.
V. Regulations as to appointment of Assistant Engineers, 1913.
VI. Memorandum by Mr. S. A. J. Keatinge, Chief Storekeeper, North Western Railway, regarding the duties of Chief Storekeeper and Storekeepers, State Railways.
VII. Statement of the Civil Appointments on Rs. 200 a month and over held by Europeans, Anglo-Indians, and Indians on the 1st April 1913, in the Railway Department.
VIII. Officials and non-officials who furnished written evidence to the Royal Commission in connection with their enquiry into the Railway Department, but who were not orally examined.

APPENDIX I.

(Referred to in paragraph 80,853— Mr. Ryan's evidence.)

INDIAN STATE RAILWAYS.

Regulations for Appointment to the Traffic Department.

[Note.-The arrangements and salaries hereinafter described are subject to revision according to the requirements of the Service.]

1. The Secretary of State for India in Council will, from time to time as may be required. make appointments of Assistant Traffic Superintendents on Indian State Railways.

2. In making these appointments he will act with the advice of a Selection Committee, nominated by him.

3. Applications for the appointments must be made on a printed form to be obtained from the Secretary, Public Works Department, India Office, Whitehall, London, S.W., by whom a list of applicants will be kept.

4. Candidates must be British subjects of not more than 25 years of age, and should be unmarried. They must also be of good moral character and sound physique.

5. Candidates must possess one or other of the following qualifications, viz. :—

(a) Not less than two years' practical experience of work in the Traffic Department of a British or Colonial Railway, together with evidence of a sound general education.

(b) A degree or diploma of any teaching University in the United Kingdom granted after not less than three years' study in that University, or a technical diploma or certificate recognised by the Secretary of State.*

6. Candidates must be prepared, if called upon, to attend at the India Office, at their own expense, for a personal interview with the Selection Committee.

7. They will further be required, before final appointment by Secretary of State in Council, to appear, also at their own expense, before the Medical Board at the India Office for examination as to their physical fitness for service in India. There is no fee for the medical examination

A copy of the "Regulations as to the Physical Examination " of candidates for Indian appointments will be forwarded on application to the Under Secretary of State

8. Selected candidates with the qualification referred to in Clause 5 sub-clause *(a)*, will, in the first instance, be appointed Assistant Traffic Superintendents on Rs. 300 or Rs. 400 per mensem, according to their qualifications.

9. Selected candidates appointed under the foregoing clause on Rs. 300 per mensem will be required to undergo the further training specified in Appendix I., and will be promoted to Rs. 400 per mensem on passing the professional examination referred to therein.

10. Selected candidates with the qualifications referred to in Clause 5, sub-clause *(b)*, will, in the first instance, be appointed Assistant Traffic Superintendents on Rs. 300 per mensem, and they will be promoted to Rs. 400 on passing the professional examination prescribed in Appendix I. on the completion of their period of training as Probationers. This period of training will ordinarily extend over one year.

11. Officers will not be entitled to pension or bonus on quitting the Service, but will be eligible throughout their service for the benefits of the State Railway Provident Institution, to which they will be required to contribute. Particulars relating to this Institution will be found in Appendix III.

12. Selected candidates will be required to enter into an agreement with the Secretary of State Officers will be liable to discharge for incompetence or misbehaviour. Subject to such liability and to the termination of their agreement on account of ill-health, their service will be for not less than three years. At the end of that period, or at any subsequent date, the service of an officer may be terminated by notice given by either party six months previously.

Service will be in any part of British India or its dependencies as directed by Government.

A free first-class passage to India will be provided; and a return passage will also be provided if the officer leaves the service at the end of his first three years of service with the approbation of Government, or if he quits the service in India earlier owing to certified ill-health not caused by his own negligence, carelessness, or misconduct.

13. Pay will begin from the date of the officer's landing in India, and, if he so desires, he will he able to obtain an advance of two months' pay, recoverable by monthly instalments of one-third of salary. Of this advance a proportion not exceeding one-half. may be received in England, and the balance can be drawn in India.

14. Particulars as to the pay and conditions of service of officers in the several grades of the Traffic Department and the leave regulations applicable to them are contained in Appendices II. and IV.

ANNEXURES.

(The particulars given in these Annexures are compiled from the regulations in force for the time being, which are subject to revision according to the requirements of the Service.)

Annexure I.

Training and Examinations.

1 Assistant Traffic Superintendents mentioned in Clauses 9 and 10 of the Regulations will on first appointment be located at the head-quarters of a District under the orders of the District Traffic

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* The following technical diplomas and certificates will be recognised by the Secretary of State :—

(a) A diploma in Engineering or Commerce granted after not less than three years' study in a constituent College of a University ;

(b) A Higher Course Diploma in Engineering or Commerce, endorsed by the Board of Education and granted after not less than three years' study in an Advanced Course at a Technical College ;

(c) A Diploma in Engineering or Commerce granted after not less than three years' study by a Central Technical or Commercial College in Scotland and endorsed by the Scotch Education Department ;

(d) A Diploma or Certificate issued or endorsed by the Department of Agriculture and Technical Instruction for Ireland and granted after not less than three years' study at a Technical or Commercial School approved by the Department.

Superintendent, who will superintend their training and will submit quarterly reports on their progress. The necessary instruction will be imparted by competent subordinates of each class deputed for the purpose.

2. On the completion of the period of training, Probationers will be required to appear for the final examination to qualify for confirmation as Assistant Traffic Superintendents.

This examination will be divided into two parts, viz.:—

(i) **A** written examination in the following subjects:—

(1) The general rules for Indian railways and the Revenue Code.
(2) The Traffic Manual, working orders, and station arrangements and working.
(3) The principle of rates.
(4) The general products of the country traversed by the railway and the direction in which these products are working; also the steps necessary for the further development ***of*** traffic, both passengers and goods.
(5) The general principles to be followed in dealing with claims cases.
(6) The preparation of time-tables.

(ii) **A** *viva, voce* examination lasting about an hour and embracing subjects connected with the general working of the Department, as well as those relating to any branch of work upon which the candidate may have been particularly engaged. This part of the examination, which will be left entirely in the hands of the examining committee, will test the amount of insight gained by the candidate into the practical working of the Traffic Department.

ANNEXURE II.

Particulars regarding the Superior Traffic Department of Indian State Railways.

1. The establishment of the Superior Traffic Department of the Indian State Railways consists of a staff of officers, military and civil, engaged on the various railways administered by the State in India.

2. This establishment is recruited from the following sources:—

(i) Officers ***of*** Royal Engineers.
(ii) Persons appointed by the Secretary of State by selection from the United Kingdom.
(iii) Persons appointed in India.
(iv) Occasional admission of other qualified persons.

3. The various ranks of the Department are as follows:—

Salary per Annum.	Rs.
Traffic Managers	**24,000**
Deputy Traffic Managers... ...	**18,000**
District Superintendents:—	
Class II., Grade **1**...	**13,200**
,, Grade **2**...	**12,000**
,, Grade **3**...	**10,800**
,, Grade **4**...	9,600
,, Grade **5**...	**8,400**
Assistant Superintendents:—	
Class III., Grade **1**	6,600
,, Grade **2**	6,400
,, Grade **3**	**4,800**
,, Grade **4**	**3,600**
,, Grade **5**	**2,400–3,000**

4. Exchange compensation allowance is not granted.

5. Officers, while in India will be entitled to travelling allowances according to the rules from time to time in force.

6. Officers with practical experience, who are selected from the United Kingdom for appointment to the Traffic Department, under Clause 5, sub-clause *(a)*, of the conditions ***of*** appointment, will be appointed to Class III., Grade **3**, or as Probationers to Class III., Grade **4**, according to their qualifications.

7. Officers selected as Probationers under the above clause or under Clause **5**, sub-clause ***(b)***, will be appointed to Class **III.**, Grade **4**, until they qualify. As soon as they qualify, they **will** be posted to Class **III.**, Grade **3**, on the usual scale of pay of that grade.

8. No officer appointed from the United Kingdom **will** receive promotion until reported competent for the work of an Assistant Superintendent, and until he has passed an examination in the vernacular.

ANNEXURE III.

Provident Fund.

The State Railway Provident Fund is established on the following basis:—

(i) The contribution is compulsory up to one-twelfth ***of*** salary, to which will be added half-yearly the following bonus:—

(a) **A** first sum out of the gross revenue of the railway equal to one-half of such subscriptions;
(*b*) **A** second sum not exceeding one-half of such subscriptions; and also not exceeding one per cent. of net earnings, calculated before any contributions to the fund have been added to the working expenses.

(ii) Voluntary deposits may also be made up to a limit of Rs. 500 a year, and to Rs. **3,000** in all, exclusive of interest.

(iii) Interest at the rate of **3** per cent. per annum in the case of accounts kept in sterling, and at 3¾ per cent. in the case of accounts kept on a rupee basis, is at present allowed on compulsory deposits and bonus, and at rates applicable to deposits in the Government Post Office Savings Bank on voluntary deposits. European and Eurasian subscribers will have the option, to be exercised within six months of joining the Fund, of having their accounts kept, in sterling or in rupees. The Government reserves the right to vary the rate of interest allowed on compulsory deposits and bonus

(iv) The sum which thus accumulates to the credit of an officer is paid to him on quitting the Service; or, in the event of his death before retirement, to his legal representatives.

ANNEXURE IV.

Leave.

The following is a summary of the principal regulations relating to the leave admissible to Officers of the Traffic Department of Indian State Railways appointed by the Secretary of State from the United Kingdom.

(a) *Short Leave.*

1. Privilege Leave is a holiday which may be granted to the extent of one eleventh part of the time that an officer has been on duty without interruption; and it may be accumulated up to three months, earned by **33** months' duty. During privilege leave the officer retains **a** lien on his appointment, and receives an allowance equal to the salary which he would receive if he were on duty in the appointment on which he has a lien. *An* interval of six months must elapse between two periods of absence on privilege leave.

Privilege leave may be prefixed to furlough, special leave, or extraordinary leave without allowances. The whole period of leave thus taken in combination is known as combined leave. Combined leave cannot **be** granted for ***a*** shorter period than six months, nor, except on medical certificate, may it be extended beyond two years. Except when privilege leave is combined with other leave, the right to receive privilege leave allowances is contingent on the officer's return to duty at the end of the privilege leave; and he may not resign the service until the lapse of a period of six months from the beginning of any privilege leave granted to him.

2. Extraordinary Leave without allowances may be granted in case of necessity, and, except in certain specified cases, only when no other kind ***of*** leave is by rule admissible. **It** may be granted in continuation ***of*** other leave.

3. Subsidiary Leave in India, usually with half average salary, may be granted to an officer proceeding on or returning from leave out of India, or on retirement, to enable him to reach the port of embarkation or to rejoin his appointment. **It** is admissible only at the end, and not at the beginning, **of** combined leave.

4. Short leave is also granted to enable **officers to** appear at examinations, &c.

APPENDIX I—*continued.*

(b) *Long Leave.*

5. Furlough and special leave with allowances (*see* paragraph 6) are admissible to an aggregate maximum amount of six years during an officer's service. The amount of furlough "earned" is one-fourth of an officer's active service, and the amount "due" is that amount less any enjoyed.

Furlough without medical certificate can, if due, be generally taken after eight years' active service, and again after intervals of not less than three years' continuous service. It is limited to two years at a time.

Furlough on medical certificate may be granted (*a*) to an officer who has rendered three years' continuous service, for not more than two years, but capable of extension up to three years, and (*b*) to an officer who has not rendered three years' continuous service, up to one year in any case, and up to such longer period, if any (but not exceeding two years), as the officer may have furlough "due" to him.

6. The allowances admissible during furlough are:—

(1) During the first two years of furlough without medical certificate and during so much of furlough with medical certificate as may be "due"—half average salary subject to certain maximum and minimum limits.

(2) After the expiration of the period for which the foregoing allowances are admissible—one quarter of average salary, subject to certain maximum and minimum limits.

7. Special Leave may be granted at any time for not more than six months, with intervals of six years' service; allowances, calculated as during furlough, are given during the first six months only, whether taken in one or more instalments.

General Rules.

8. Leave of absence can never be claimed as of right, and is given or refused at the discretion of Government.

9. After five years' continuous absence from India, an officer is considered to be out of the employment of Government.

10. When leave allowances are paid at the Home Treasury, or in a Colony where the standard of currency is gold, rupees are converted into sterling at the rate of exchange fixed for the time being for the adjustment of financial transactions between the Imperial and Indian Treasuries unless any other rate has been exceptionally authorised. But for the present the rate of conversion is subject to a minimum of 1*s.* 6*d.* to the rupee for all leave allowances excepting privilege leave pay; the latter when issued from the Home Treasury (this is only admissible when privilege leave is combined with other leave) being converted at 1*s.* 4*d.* to the rupee.

APPENDIX II.

(Referred to in paragraph* 80,853—*Mr. Ryan's evidence.)

RULES FOR THE RECRUITMENT IN INDIA OF THE SUPERIOR TRAFFIC DEPARTMENT OF STATE RAILWAYS.

Appointments in India will be made from time to time as may be required by the Railway Board under the following conditions:—

(1) Applications of candidates will be invited by public advertisement when necessary. Such applications should, preferably, be made on a printed form to be obtained from the Secretary, Railway Board, Simla.

(2) Candidates must be over 19 and under 23 years of age, of good education, and suitable social position. They must be prepared, if called upon to attend at the Railway Board's office at their own expense, for a personal interview.

(3) Candidates will be appointed Assistant Traffic Superintendents on probation in Class III., grade 5, of the Superior Revenue Establishment of State Railways, on a salary of Rs. 200 per mensem for the first year of service, on the non-pensionable establishment.

Probationers, who during the first year's service pass two out of the three examinations prescribed in paragraph (8) will receive a salary of Rs. 250 per mensem during the second year's service, and on fully qualifying in the manner prescribed in paragraph (10) and passing the Lower Standard in Hindustani, they will be confirmed as Assistant Traffic Superintendent and promoted to Class III., grade 4, of the Superior Revenue Establishment of State Railways, on Rs. 300 per mensem.

(4) Should they fail to qualify in two years they will be allowed six months' grace, and if they have not then qualified, their services will be dispensed with.

(5) Officers will not be entitled to pension or bonus on quitting the service but will be eligible throughout their service to the benefits of the State Railway Provident Fund Institution, to which they will be required to contribute. Particulars relating to this Institution will be found on page 23.

(6) Particulars as to the pay of officers in the several grades of the Traffic Department and the leave regulations applicable to them are contained in Annexure I.

Training.

(7) Assistant Traffic Superintendents will, on first appointments, be located at the headquarters of a district under the orders of the District Traffic Superintendent, who will superintend their training and will submit quarterly reports on their progress to the Traffic Manager. The necessary instruction will be imparted by competent subordinates of each class deputed for the purpose.

(8) The course of training in the district office will extend over a year and. under present arrangements, will be divided into the following courses:—

Nature of Duties.	Period of Training.
(*a*) Guard Booking clerk Goods clerk	5 months.
(*b*) Assistant Station Master Station Master ...	5 months.
(*c*) Traffic Inspector	2 months.

and an examination will be held at the end of each period to test their progress and efficiency.

(9) The course of training during the second year of service, under present arrangements, will be as follows:—

Nature of Duties.	Period of Training.
(*a*) Trains and Claims . .	4 months.
(*b*) Rates and Time Tables ..	4 months.
(*c*) Personal Assistant to District Traffic Superintendent	4 months.

As regards (*a*), the officers in effective charge, respectively, of the duties in the district office (or in the Traffic Manager's office when claims are dealt with at headquarters) will be held responsible for the training of probationers, and will submit monthly progress reports to the District Traffic Superintendent or Traffic Manager, as the case may be.

As regards (*b*), the period will be spent in the head office, and the Traffic Manager will be required to take a personal interest in the training and progress of probationers.

As regards (*c*), the probationers will serve as Personal Assistants to the District Officers under whom they had respectively received their previous training. They will receive general instruction in the other branches of his office and will be sent out on the line, on occasions, to investigate cases and to report generally on traffic.

(10) On the completion of the second period of training probationers will be required to appear for the final examination to qualify for confirmation as

APPENDIX II—*continued.*

Assistant Traffic Superintendents. This examination will be divided into two parts, viz.:—

(i) A written examination in the following subjects:—

(1) The general rules for Indian railways and the Revenue Code.

(2) The Traffic Manual, working orders, and station arrangements and working.

(3) The principle of rates.

(4) The general products of the country traversed by the railway and the direction in which these products are working; also the steps necessary for the further development of traffic, both passengers and goods.

(5) The general principles to be followed in dealing with claims cases.

(6) The preparation of time-tables.

(ii) A *viva voce* examination, lasting about an hour, and embracing subjects connected with the general working of the department as well as those relating to any branch of work upon which the candidate may have been particularly engaged. This part of the examination, which must necessarily be left entirely in the hands of the examining committee, will test the amount of insight gained by the candidate into the practical working of the Traffic Department.

General.

(11) The Railway Board reserve to themselves the power to make appointments in India from the superior traffic staff of companies railways or other sources on such rates of pay as the qualifications and experience of the persons may warrant. A small proportion of the recruitment in India will, as hitherto, be made by promotion from the subordinate grades of men of good character and education who have proved their fitness for advancement to the superior grades. Officers of the Corps of Royal Engineers are also eligible for employment in the Traffic Department.

ANNEXURE I.

PARTICULARS REGARDING THE SUPERIOR TRAFFIC DEPARTMENT OF INDIAN STATE RAILWAYS.

1. The establishment of the Superior Traffic Department of Indian State Railways consists of a staff of officers, military and civil, engaged on the various railways administered by the State in India.

2. This establishment is recruited from the following sources:—

(i) Officers of Royal Engineers;

(ii) Persons appointed by the Secretary of State by selection from the United Kingdom;

(iii) Persons appointed in India;

(iv) Occasional admission of other qualified persons;

(v) Occasional appointments from the subordinate ranks of the Department.

3. The various ranks of the Department are as follows:—

	Salary per mensem. Rs.
Traffic Managers ...	2,000
Deputy Traffic Managers	1,500
District Superintendents:—	
Class II., Grade 1	1,100
,, Grade 2 ..	1,000
,, Grade 3	900
,, Grade 4	800
,, Grade 5	700
Assistant Superintendents:—	
Class III., Grade 1	550
,, Grade 2	450
,, Grade 3	400
,, Grade 4	300
,, Grade 5	200—250

4. Exchange compensation allowance is not granted.

5. Officers will be entitled to travelling allowances according to the rules from time to time in force:—

APPENDIX III.

(Referred to in paragraphs 80,861–68—Mr. *Ryan's evidence.)*

INDIAN STATE RAILWAYS.

REGULATIONS FOR APPOINTMENT TO THE LOCOMOTIVE AND CARRIAGE AND WAGON DEPARTMENTS.

[Note.—The arrangements and salaries hereinafter described are subject to revision according to the requirements of the Service.]

1. The Secretary of State for India in Council will, from time to time as may be required, make appointments of Assistant Superintendents in the Locomotive and Carriage and Wagon Departments of Indian State Railways.

2. In making these appointments he will act with the advice of the Consulting Engineer to the India Office.

3. Application for the appointments must be made on a printed form to be obtained from the Director-General of Stores, India Office, Whitehall, London, S.W., by whom a list of applicants will be kept.

4. Candidates must be a British subject of about 24 years of age, and should be unmarried. They must also be of good moral character and sound physique.

5. Appointments in the *Locomotive* Department will generally be made from men trained in locomotive workshops in Europe. Candidates must have had a good general and technical education, followed by at least three years' training in the shops of a railway company and six months' training in the running sheds and firing, as distinguished from training in a contractors' shop where engines are only built and where experience in firing, running, and general railway work cannot be obtained.

Candidates for appointment in the *Carriage and Wagon* Department must have served as pupils or apprentices in the carriage and wagon or locomotive shops of a railway company, or in the carriage shops of a large rolling stock builder, followed in either case by at least a year's experience as Outside Assistant in the Carriage and Wagon Department of a British railway.

All candidates must have a thorough understanding of applied mechanics and the nature and composition of all materials used in shops, and should be able to design and to calculate the stresses on the parts of the machines. Some actual drawing office experience is also desirable.

6. Candidates must be prepared, if called upon, to attend, at their own expense, at the India Office, or for a personal interview with the Consulting Engineer, Sir A. M. Rendel, K.C.I.E., 13, Dartmouth Street, Westminster, S.W.

7. They will further be required, before final appointment by the Secretary of State in Council, to appear, also at their own expense, before the Medical Board at the India Office for examination as to their physical fitness for service in India. There is no fee for the medical examination.

A copy of the "Regulations as to the Physical Examination" of candidates for Indian appointments will be forwarded on application to the Under Secretary of State.

8. Selected candidates will in the first instance be appointed Assistant Superintendents on Rs. 300, Rs. 400, Rs. 450, or Rs. 550 per mensem, according to their qualifications.

9. Officers will not be entitled to pension or bonus on quitting the Service, but will be eligible throughout their service for the benefits of the State Railway Provident Institution, to which they will be required to contribute.

10. Selected candidates will be required to enter into an agreement with the Secretary of State. Officers will be liable to discharge for incompetency or misbehaviour. Subject to such liability and to the termination of their agreement on account of ill-health, their service will be for not less than three years. At the end of that period, or at any subsequent date, the service of an officer may be terminated by notice given by either party six months previously.

Service will be in any part of British India or its dependencies as directed by Government.

A free first class passage to India will be provided; and a return passage will also be provided if the officer leaves the service at the end of his first three years of service with the approbation of Government, or if he quits the service in India earlier owing to certified ill-health not caused by his own negligence, carelessness or misconduct.

11. Pay will begin from the date of the officer's landing in India, and, if he so desire, he will be able to obtain an advance of two month's pay, recoverable by monthly instalments of one-third of salary. Of this advance, a proportion not exceeding one-half may be received in England, and the balance can be drawn in India.

12. Particulars as to the pay and conditions of service of officers in the several grades of the Locomotive and Carriage and Wagon Departments, are contained in the Annexure.

ANNEXURE.

PARTICULARS REGARDING THE SUPERIOR LOCOMOTIVE AND CARRIAGE AND WAGON DEPARTMENTS OF INDIAN STATE RAILWAYS.

1. The establishment of the Superior Locomotive and Carriage and Wagon Departments of Indian State Railways consists of officers engaged on the various railways administered by the State in India.

2. These establishments are recruited from the following sources:—

(*i*) Persons appointed by the Secretary of State by selection from the United Kingdom;

(*ii*) Persons appointed in India;

(*iii*) Occasional admission of other qualified persons.

3. The various ranks of the Departments are as follows:—

	Salary per annum. Rs.
Locomotive Superintendents	24,000
Deputy Locomotive Superintendents ...	15,000 *or* 18,000
Cariage and Wagon Superintendents ...	18,000 *or* 21,000

Both Departments.	Salary per annum. Rs.
District Superintendents:—	
Class II, Grade 1	13,200
,, Grade 2	12,000
,, Grade 3	10,800
,, Grade 4	9,600
,, Grade 5	8,400
Assistant Superintendents:	
Class III, Grade 1	6,600
,, Grade 2	5,400
,, Grade 3	4,800
,, Grade 4	3,600
,, Grade 6	2,400—3,000

4. Exchange compensation allowance is not granted

5. Officers while in India will be entitled to travelling allowances according to the rules from time to time in force.

6. No officer appointed from the United Kingdom will receive promotion until reported competent for the work of an Assistant Superintendent, and until he has passed an examination in the vernacular.

APPENDIX IV

(Referred to in paragraph 80,965—Mr. Ryan's evidence.)

Supplementary Memorandum by Mr. T. Ryan.

As promised by me in the course of my oral evidence before the Royal Commission on the 13th November 1913, I submit the following supplementary notes, etc.:—

(*a*) *Figures of the increase of cost due to the introduction of the time-scale of Pay for the Engineering Establishment in* 1908.—The information will be found in Appendix I attached.

(*b*) *A list of the temporary Engineers now in the Railway Service showing how long each has been continuously* employed.—The information is contained in Appendix II hereto.

(*c*) *A statement showing how many Assistant Traffic Superintendents have been appointed under the rules quoted in paragraphs 5 (a) and 5 (b) of my memorandum, page* 34.—The rules referred to have been in force since October 1909. Of twenty-seven officers appointed under these rules fourteen were appointed under paragraph 6 (*a*) and thirteen under paragraph 5 (*b*).

(*d*) *An explanation of the fact that the Locomotive Department was much below its cadre strength.*—The question which I was asked on this point is attributable to the fact that the cadre had only recently been increased to its present figure. The officers necessary to complete the sanctioned strength are at present being appointed.

(*e*) *A comparison of the salaries paid by important Railway Companies to their gazetted staff, with those paid on the Indian State Railways.*—The information will be found in Appendix III to this note.

(*f*) *A statement showing the proportion of Indians and of members of the domiciled community employed at present, and within the last few years.*—Please see statement IV below.

(*g*) A *supplementary explanation regarding the recruitment of Provincial Engineers only from the Thomason Civil Engineering College, Rurki.*—I find that the Civil Engineering Colleges at Sibpur and Poona do train students for superior engineering posts as was suggested, but only one appointment is guaranteed to each College, and those who gain them are appointed to the Public Works Department in Bengal and Bombay respectively. My evidence to the effect that the Indian College trained officers appointed to Railways are recruited only from the Rurki College is correct.

T. RYAN,
Secretary, Railway Board.

SIMLA;
The 23rd December 1913.
(With four appendices.)

STATEMENT I.

As far as can be ascertained the actual number of Engineer Officers in the Railway Department at the time of the introduction of the time-scale of pay in 1908 (excluding those who were not affected by this change) was 164, of whom:—

40 were Royal Engineers
88 were Imperial Engineers.
36 were Provincial Engineers.

Total... 164

Working on these figures and following the method of calculation on actuarial averages employed by Government, the extra cost was that shown in the following table:—

APPENDIX IV—continued.

Class.	Nos.	Before introduction of the Time-Scale.		After introduction of the Time Scale.		Difference extra cost.
		Average cost.	Total cost.	Average cost.	Total cost.	
		Rs.	Rs.	Rs.	Rs.	Rs.
Royal Engineer Officers	40	839·06	33,562-40	877·90	35,116·00	1,553·60
Imperial Officers (Executives and Assistants)	88	ti4715	56,949·20	820·32	72,188.16	15,23896
Provincial Officers (Executives and Assistants)	36	461.40	16,610.40	536.16	19,301·76	2,691·36
Total	164	—	107,122.00	—	1,26,605·92	19,483·92

The excess cost as above comes to Rs. **19,484** per mensem or **Rs.** 2,33,808 per annum.

Should the Royal Commission desire to have precise actual figures, these can be obtained only by reference to all of the several Audit Officers concerned. The reference will be made if required, but would necessarily involve considerable delay.

STATEMENT II.

The following list gives the particulars desired by the Royal Commission regarding temporary Engineers at present employed in the Railway Department :—

Seria No.	Names.	Date of appointment.	Total continuous service (calculated up to November 1913).		Pay.	Remarks.
			Y.	M.	Rs.	
1	Amesbury, W. **A.**	July, 1909	4	5	550	Has also Public Works Department service it is believed.
?	Angell, **C.** H. **C.**	February, 1901	9	9	650	*Plus* a local allowance of Rs. 65 while employed in Assam.
3	Atherton, **P. W.**	November, 1911	2	0	500	
4	Bell, W. C.	February. 1913	0	9	250	Has also survey service.
5	Bewlep, W.	October, 1904	9	1	800	*Plus* a local allowance of Rs. 100.
6	Bibra, F. H.	January, 1896	17	10	1,050	Sanctioned pay Rs. 1,000—50—1,250. Draws in addition Calcutta house allowance, and Rs. 100 while employed as Superintendent of Works.
7	Bose, **J. N.**	January, 1904	9	10	500	*Plus* a local allowance of Rs. 50.
8	Bright, **A. J.**	March, 1912	1	8	400	Has other service though perhaps not Continuous.
9	Chatterjee, Bhut Nath	April, 1911	2	7	750	
10	Chowdhury, S. **C.**	June, 1909	4	5	350	
11	Craker, **P. W.**	May, 1910	3	6	350	
12	Dass. P. G.	April, 1911	2	7	300	*Plus* **Rs.** 65 while in Assam.
13	Delanougerede. R. A.	January, 1902	11	10	1,100	
14	Delanougerede; **V.** A.	December, 1910	2	11	350	
15	Dutt. Divakar	January, 1912	1	10	250	
16	Edmonds, **A. M.**	January, 1912	1	10	350	
17	Fitzherbert, A. T.	January, 1907	6	10	400	
18	Gilbert, C. F.	Novembor, 1907	6	0	500	
19	Grant, **A.** G.	July, 1905	8	4	450	*Plus* a frontier allowance of Bs. 100.
20	Grant. L. H.	March, 1911	2	8	400	
21	Green; **A.**	November, 1910	3	0	350	
22	Irani, M. H.	January, 1905	8	10	550	
23	King, A. W.	October, 1898	15	1	600	
24	Korgaokar, H. K.	June, 1912	1	5	250	
25	Lane, T. R. **P.**	September: 1905	8	2	650	
26	Langley, L. H. L.	March, 1913	0	8	300	
27	LePatourel, **P.**	August, 1913	0	3	300	
28	Mandhata, H. L.	February, 1911	2	9	360	
29	Marriott, D. **A.**	June, 1889	24	5	750	
30	Marshall, A. **D.**	January, 1912	1	10	400	
31	Martin, F. B.	October, 1902	9	1	550	
32	Mayer, **J.** J.	February, 1902	1	9	600	
33	McInerny, **A.**	December, 1901	11	11	500	
34	Meares, **G.** W.	January, 1899	14	10	550	*Plus* a frontier allowance of Rs. 100.
35	Morgan, **C.** H.	June, 1912	1	5	600	
36	Nunn, J. W.	November, 1908	5	0	1,000	Has had other service.
31	Newson, **H.** J.	August, 1913.	0	4	300	
38	Oram, F. J.	November, 1899	14	0	500	
39	Parkinson, H. **A.**	March, 1912	1	8	300	*Plus* a local allowance of Rs. 50.
40	Patterson, E. J. C.	October, 1906	7	1	450	
41	Pogose, **F.** D.	February, 1912	1	9	250	
42	Powis, L. J.	July, 1913	0	4	250	
43	Pruce, E. L.	March, 1912	1	8	300	
44	Rego, A. C.	April, 1913	0	7	400	
45	Rosetto, **F. A.**	July, 1913	0	4	450	Has subordinate service also.
46	Saberwal, B. R.	August, 1912	1	3	250	
47	Sahgal, Har Narayan	September, 1911	2	2	275	
48	Sankey, W. R. W.	June, 1911	2	5	500	
49	Sawhney, B. R.	March 1913	0	8	400	
50	Shaikh Abdul Latif	October, 1913	0	1	250	
51	Sullen, E. S.	April, 1911	2	8	450	
52	Sunder Singh	January, 1912	1	10	600	Probably has other service
53	Waite. **C.** S.	September, 1911	2	2	600	
54	Watson, H.	May, 1908	5	6	400	
55	Watts, R. W.	March, 1911	2	8	450	
56	Webster, H. **J.**	March, 1912	1	8	400	(Temporarily employed in *the* C and W Department.)
57	Wells, H. S.	Nay, 1896	17	6	650	

STATEMENT III.

The following Statement affords a ready comparison between the pay given in the chief departments upon State Railways in India and upon the more important Company-worked lines in the same country.

Information regarding the salaries of Railway officers in Great Britain is not available, but reference may perhaps be made to the written evidence tendered to the Commission by Colonel C. A. R. Browne, Agent, Eastern Bengsl Railway, in which an article containing certain information upon this head, extracted from the "Railway Gazette," has been quoted :—

Charges or Posts.	State Railways. 2	East Indian Railway. 3	Bengal-Nagpur Railway. 4	Bombay, Baroda and Central India Railway 5	Great Indian Peninsula Railway. 6	Madras and Southern Mahratta Railway. 7	South Indian Railway. 8	Remarks. 9
Agency.	Rs.	Rs.	Rs.	Rs.	Rs.	Rs.	Rs.	
Agent	3,000'	3,500	3,500	3,500	3,500	3,000	3,000	*Sanctioned pay of the Agent, Oudh and Rohilkhand Railway, is Rs. 2,500.
Deputy Agent	1,500 and 1,750	—	1,400—1,800	1,800	2,000	1,350—1,500	—	
Engineering.								
Chief Engineer (open Line) ...	1,500—2,750(1)	2,000—2,500	1,600—2,000	2,000 (Engineer-in-Chief 1,800)	2,500	2,000—2,250	2,000	(1) The officers draw their pay as Superintending or Chief Engineers the pay of which is within the limits shewn here.
Chief Engineer (constrnction) ...	1,500—2,750 (1)	—	—	1,500—1,750	—	—	—	
Deputy Chief Engineer	1,500—2,000	1.800	1,400—100—1,600	—	1,500—1,800	1,400	1,150—1,350	
District Officers	†800—1,250 ‡535—850	1,200 (Resident Engineers 800—1,000)	700—50—1,200	800—1,250	1,250 (Resident Engineers 600—800)	950—50—1,100 750—50—900	700—50—1,000	†Imperial service. ‡Provincial service.
Assistant Officers	§380—750 ‖250—475	350—600	350—33-5-4—600	400—700	450—500	650 500 400	400—25—600	§Imperial service. ‖Provincial service.
Traffic Department.								
Traffic Manager ..., ...	2,000	2,000—2,500	1.600—2,000 (Superintendents of Transportation and Goods 1,200—1,400)	2,500	2,500	1,800—2,200	2,000	
Deputy Traffic Manager	1,500	1,600	—	1,500	1,600 and 1,400	1,400 and 1,250	1,150—1,350	
District Traffic Superintendents	700—1,100	800—1,000	700—1,000	700—1,250	1,000	[illegible]	700—1,000	
Assistant Traffic Superintendents	200—550	250—600	250 – 500	400—600	500—600	350—600	400—600 250—350	
Locomotive and C. and W. Departments.								
Locomotive Superintendent ...	2,000	2,000—2,500	1,600—2,000 (Superintendent of Workshop 1,200—1,400)	2,000	2,500	1,800—2,200	2,000	
Deputy Lccomotive Superintendent.	¶1,500	1,250—1,400	—	1,250	1,400	1,200—1,400	1,150—1,350	¶There is no Deputy Locomotive Superintendent on Oudh and Hohilkhand Railway.
District Locomotive Superintendent.	700—1,100	720—1,250	700—1,200	700—1,250	1,000—1,250	700—1,100	700—1,000	
Assistant Locomotive Superintendent.	200—550	400—600	450—800	400—600	600	350—600	400—700	North Western, East Indian, Bombay, Baroda and Central India and Great Indian Peninsula Railways have separate Carnage and Wagon Departments aud the other Railways have combined Locomotive and Carriage and Wagon Departments.
Carriage and Wagon Superintendent.	North-Western Railway. 1,750	1,800	—	1,600	1,800	—	—	
Deputy Carriage and Wagon Superintendent.	1,250	1,000—1,200	—	1,000	1,100	—	—	
District Carriage and Wagon Superintendent.	700—1,100	600—800	—	—	—	—	—	
Assistant Carriage and Wagon Superintendent.	200—550	250—450	—	600	G00	—	—	

STATEMENT III.—*continued.*

Charges or Posts. 1	State Railways. 2	East Indian Railway. 3	Bengal-Nagpur Railway. 4	Bombay, Baroda and Central India Railway 5	Great Indian Peninsula Railway. 6	Madras and Southern Mahratta Railway. 7	South Indian Railway. 8	Remarks. 9
Stores Department.	Rs.	Rs.	Rs.	Rs.	Rs.	Rs.	Rs.	
Chief Store Keeper	North Western Railway 1,500, Eastern Bengal Railway 1,400, Oudh and Rohilkhand 1,250.	1,200—1,500	1,000—1,400	1,400	1,400	1,250	1,000—1,200	
Store Keepers	600—950	600—1,000	—	600—800	1,000	500—700	550—600	
Assistant Store Keeper	200—500	—	250—700	300—450	400—600	200—400	250—500	
Signalling Department.								
Signal Engineer	(1,000—1,250 North-Western and Oudh and Rohilkhand Railway) (700—1000 Eastern Bengal Railway).	1,200	(*a*)	1,000	1,250	—	1,000—1,200	(*a*) See pay given to District and Assistant Engineers, under " Engineering above.
Senior Assistant Engineer ...	(700—900 North-Western and Oudh and Rohilkhand Railways).	(*a*)	(*a*)	650	600—700	—		
Junior Assistant Engineer ...	400—600	—	—	—	—	—	—	

STATEMENT IV.

The following statement shows the proportions of Indians and of members of the domiciled community employed at present and within the last few years:—

A.—ENGINEER ESTABLISHMENT.

Year.	Indians.	Anglo-Indians.	Proportion of classes named.
1907 ...	11	28	1 to 2½ or 28·2 per cent.
1910	13	25	1 to 2 or 34·2 per cent.
1913	19	26	1 to 1·37 or 42·2 per cent.

These figures both for Anglo-Indians and Indians include men appointed from Cooper's Hill or possessing other English qualifications. All *provincial* engineers are necessarily Indians or Anglo-Indians.

B.—SUPERIOR REVENUE ESTABLISHMENT.

(1) *Traffic Department.*

Year.	Indians.	Anglo-Indians.	Proportion of classes named.
1907	2	12	1 to 4 or 25 per cent.
1910	5	20	1 to 6 or 14·2 per cent.
1913	10	22	1 to 2·2 or 31·2 per cent.

(2) *Locomotive and Carriage and Wagon Departments.*

All Locomotive and Carriage and Wagon officers are recruited from England and comprise Europeans only.

(3) *Stores Department.*

Year.	Indians.	Anglo-Indians.	Proportion of classes named.
1907	1	5	1 to 5 or 16·6 per cent.
1910	1	7	1 to 7 or 12·8 per cent.
1913	1	10	1 to 10 or 9·1 per cent.

(4) *Signal Department.*

1907	Nil.	Nil.	—
1910	Nil.	1	—
1913	Nil.	1	—

(5) *Medical Department*

1907	1	Nil.	—
1910	1	1	equal shares or 50 per cent.
1913	1	1	equal shares or 50 per cent.

APPENDIX V.

(Referred to in paragraphs 80,845 and 80,851—Mr. Ryan's evidence.)

INDIAN PUBLIC WORKS DEPARTMENT AND INDIAN STATE RAILWAYS.

Regulations as to appointment of Assistant Engineers, 1914.

1. The Secretary of State for India in Council will, in the year *1914*, make *about* **30** appointments of Assistant Engineers in the Public Works and State Railway Departments of the Government of India.

In making these appointments he will act with the advice of a Selection Committee, including at least one eminent representative of the Engineering profession.

2. Applications for the appointments must be made on a printed form to be obtained from the Secretary, Public Works Department, India Office, Whitehall, London, S.W., and to be returned so as to reach him not earlier than 1st February 1914,* and not later than *Wednesday the 1st April 1914.*

3. Candidates must have attained the age of *21* and not attained the age of *24* years on the 1st July, *1914.* To this rule no exception can be made.

[*N.B.*—Natives of India must obtain a certificate of age and nationality *in the form explained* in *Annexure ZZ.* As the production of this certificate is a necessary condition of appointment candidates are advised to procure it without delay. The certificate should be forwarded to the India Office together with the candidate's form of application or at the earliest subsequent opportunity.]

4. Every candidate, except as provided in Regulation 5, must be a British subject of European descent, and at the time of his birth his father must have been a British subject, either natural-born or naturalised in the United Kingdom. The decision of the Secretary of State in Council as to whether a candidate satisfies this condition shall be final. He must also be of good moral character and sound physique.

5. Natives of India who are British subjects, and are not qualified under Regulation 4, are eligible for appointment, and shall be selected to the extent of 10 per cent. of the total number of Assistant Engineers thus recruited, if otherwise duly qoalified.

6. Candidates must produce evidence that they have either (1) obtained one of the University degrees mentioned in Annexure I; or (2) passed the A.M.I.C.E. examination; or *(3)* obtained such other diploma or distinction in Engineering, as may, in the opinion of the Selection Committee, be accepted as approximately equivalent to the degrees mentioned.

It will be for the Selection Committee to decide in dealing with the applications, whether they will recommend any candidate under head *(3).*

7. It is preferred that candidates should have taken a college course and obtained one of the degrees mentioned in Annexure I. It is advisable that in addition they should have had at least one full year's practical experience of Civil Engineering under a qualified civil engineer at the time when they appear before the Selection Committee. Those whose qualifying diploma has been obtained without a college course should have had a full three years of such practical experience. In the event of any candidate being selected who has not, in the opinion of tho Selection Committee, had sufficient practical experience, he may be required to undergo, after arrival in India, a year's probation in charge of works, and his final appointment will be made dependent upon the result of such probation.

8. Candidates must be prepared, if called upon, to attend at the India Office, at their own expense, for a personal interview with the Selection Committee, which will probably take place at the **end** of April or early in May *1914.*

9. They will further be required, before final appointment by the Secretary of State in Council, to appear, at their own expense, before the Medical

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* Applications from candidates not resident in the United Kingdom may be submitted before this date and since the India Office can not undertake to correspond with candidates except by letter, such applications should be submitted as early as possible.

Board at the India Office for examination as to their physical fitness for service in India.

The Regulations governing the physical examination of candidates for the Public Works and State Railway Departments of the Government of India are given in Annexure V.

*10. Selected candidates will also be required to satisfy the Secretary of State, in such manner as he may determine, of their ability to ride.

11 They will on appointment be provided with a free first-class passage to India and they will be expected to proceed thither about the end of September **1914**

Their pay will begin from the date of their landing in India, and, if they so desire, they will be able to obtain an advance of two months' pay, recoverable by monthly instalments of one-third of salary. Of this advance a proportion not exceeding one-half may be received in England, and the balance can be drawn in India.

12. They will enter the Service as Assistant Engineers, on a salary of Rs. 4,360 a year (equivalent to £304 a year, when the rupee is at 1*s.* 4*d.*).

13. The instruments required by Assistant Engineers are supplied to them in India.

14. Particulars as to their prospects of pay, pension, &c., are contained in Annexures III. and IV

India Office, December 1913.

Note for the Information and Guidance of Candidates.

The Selection Committee of **1906** drew attention to the subjects which were held to be of most importance for the Public Works Service, viz. :

Pure Mathematics, including a knowledge of the differential and integral calculus.

Applied *Mathematics.*

Geometrical and Engineering Drawing.

Surveying and Geodesy.

Strength of *Materials and Theory of Structures.*

Hydraulics.

Heat. Engines.

Materials used in Construction.

Building Construction.— Wood and metal work, limes and cements, and building with stone, brick, and concrete.

Knowledge of the principles of road-making, waterworks, sanitary and railway engineering. (Important.)

The Selection Committee were further of opinion that all candidates should have some workshop training.

The following Announcement regarding the recruitment of the Public Works Department in future years is published for the information of intending candidates : —

> *The foregoing Regulations* apply *only to the appointment of Assistant Engineers in the permanent establishment of the Public Works* **De***partment in* **1914,** *but it is the intention* of *the Secretary* of *State for India in Council, as at present advised, to recruit the permanent establishment of the Department in succeeding years in the same general lines as those already laid down;* see, however, Note to Annexure **I.**
>
> *The Secretary* of *State is unable to give any undertaking that the Regulations will remain unaltered in the future.*

ANNEXURE I.

LIST OF DEGREES REFERRED TO IN PARAGRAPH 6.

Note.— Certain modifications of *this Annexure to be applicable to students entering* on *their University course after June* **1914** *are under* **con***sideration.*

University of Oxford.—B.A. (with honours in the Engineering Science Final Honours School).

University of *London.*—B.Sc. (Engineering).

University of Cambridge.— B.A. Honours (Mechanical Science Tripos).

University of *St. Andrews.*—B.Sc. (Engineering).

University of Glasgow.—B.Sc. (Engineering).

University of *Edinburgh.*—B.Sc. (Engineering).

Victoria University of Manchester (or Victoria University).—B.Sc. (with honours in Engineering), and B.Sc. Tech. in "Mechanical" or "Electrical" Engineering (Honours Division **in** the Final Examination).

University of Liverpool.—B.Eng.; provided the degree be obtained by passing the Examinations of the University.

University of Leeds.—B.Sc. in Civil or Mechanical Engineering.

University of *Sheffield.*—B.E. (First Class in the Final Examination).

University of Birmingham—B.Sc. (Engineering). Provided that the Engineering Matriculation Examination shall have been passed before entry upon any course of study which forms part of the Degree course; and that a regular course of study, occupying not less than three academical years, shall have been pursued between the passing of such Matriculation Examination and the passing of the Final Examination for the degree.

University of Dublin.—B.A.I.

Royal University of Ireland.—B.E. and M.E.

University of Wales.—B.Sc. (in the Department of Civil, Mechanical, or Electrical Engineering).

University of *Durham.*—B.Sc. in Civil, Mechanical, or Electrical Engineering or in Naval Architecture; provided that the Matriculation Examination for Engineering and Naval Architecture shall have been passed before entry upon any course of study which forms part of the degree course.

University of Bristol.—B.Sc. in Civil or Mechanical Engineering.

Other degrees.—Any other degree of **a** University or College in the United Kingdom which may hereafter be recognized by the Council of the Institution of Civil Engineers as exempting the holder from passing the examination for Associate Membership.

ANNEXURE II.

Particulars regarding the Certificate of Age and Nationality to be obtained by Candidates who are Natives of India.

A.—Rules for Candidates born within His Majesty's Dominions.

1. A candidate who is resident in British India must obtain a certificate signed either *(a)* by the Secretary to Government (or his lawful deputy) of the province in which his family resides, or *(b)* by the Commissioner (or his lawful deputy) of the district in which his family resides.

2. A candidate who is resident in a Native State must obtain **a** certificate signed by the highest Political Officer (or his lawful deputy) accredited to the State in which his family resides.

3. The Certificate required must be in the following form : —

> "I hereby certify that   has submitted the proofs of his birth detailed below", and has satisfactorily shown that he was actually born on or about the date stated, viz., the   day of   , 18   , at   a place within His Majesty's dominions."
>
> * (Here enter details.)

and the nature of the evidence produced must be such as to satisfy the officer who issues the certificate.

4. The documentary evidence which a candidate may be expected to produce in order to obtain such certificate comprises : —

(a) The horoscope.

(b) Family **books.**

(c) Tradesmen's account books showing entries relating to birth.

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* Selected candidates will be examined by the Civil Service Commissioners as to their ability to, and will be required *to* obtain either—

(a) a certificate from the Civil Service Commissioners that they are able to ride well and to perform journeys on horseback; or

(*b*) a certificate from the Civil Service Commissioners of minimum proficiency in riding.

In the latter case they will be subjected, on their arrival in India. to such further tests in riding as may be prescribed by their Government.

Candidates are warned that the Certificate of minimum proficiency in riding, without which they will not be allowed to proceed to India, is only granted to, those who can qualify in *a* series of tests, which includes jumping.

The chief tests will be saddling and bridling; mounting and dismounting; trotting and cantering; riding at a trot without stirrups; riding at a trot with stirrups but without reins, jumping a hedge hurdle about 3 feet in height.

Although the examination will, in the main. be confined to these points. the examiner will not be debarred from applying any other tests which may appear desirable.

APPENDIX V—*continued.*

(*d*) The record of admission in the registers of the school in which the candidate was educated, and the record of the candidate's age at various periodical school examinations.

(*e*) If the candidate is matriculated, a certified copy of his application to the Registrar in Form **A.**

Oral testimony from persons able to give relevant evidence may also be taken.

5. If a candidate has proceeded to England without obtaining a certificate, the certificate may be granted to his father or guardian on production of the requisite evidence.

B.—Rules for Candidates not born within His Majesty's Dominions.

6. The rules are the same as the foregoing except that a candidate not born within His Majesty's dominions must also prove that he is the son or grandson of a person born in those dominions, and in his case the form of certificate must be not as in paragraph 3 above but as follows :—

> "I hereby certify that   has submitted the proofs of his birth detailed below*, and has satisfactorily shown that he was actually born on or about the date stated, viz., the   day of   18 , and that he was born at a place without His Majesty's dominions, but that he is $\frac{\text{son}}{\text{grandson}}$ of a person born in those dominions."
>
> * (Here enter details.)

ANNEXURE III.

Particulars regarding the Indian Public Works Department (Executive Branch).

(The arrangements and salaries hereinafter described are subject to revision according to the requirements of the Service.)

1. The Engineer Establishment of the Indian Public Works Department consists of a staff of Engineers, military and civil, engaged on the construction and maintenance of the various public works undertaken by the State in India.

2. The permanent establishment of the Department is recruited from the following sources :—

(1) Officers of Royal Engineers.

(2) Persons appointed to the Imperial Service by the Secretary of State by selection from the United Kingdom.

(3) Persons educated at the Government Civil Engineering Colleges in India. and appointed to the Provincial Services by the Government of India.

(4) Occasional admission of other qualified persons.

3. The various ranks of the Department are at present as follows :—

	Salary per Annum (Imperial Service). Rs.
Chief Engineer, First Class	33,000
„ „ Second Class ...	30,000
Superintending Engineer, First Class	24,000
„ „ Second Class	21,000
„ „ Third Class	18,000
Executive Engineer, 20th year of service and following years	15,000
Executive Engineer, 19th year of service	14,400
„ „ 18th year of service	13,800
„ „ 17th year of service	13,200
„ „ 16th year of service	12,600
„ „ 15th year of service	12,000
„ „ 14th year of service	11,400
„ „ 13th year of service	10,800
„ „ 12th year of service	10,200
„ „ 11th year of service	9,600
*Assistant Engineer, 10th year of service	9,000
„ „ 9th year of service	8,400
„ „ 8th year of service	7,920
„ „ 7th year of service	7,440
„ „ 6th year of service	6,960
„ „ 5th year of service	6,480
„ „ 4th year of service	6,000
„ „ 3rd year of service	5,520
„ „ 2nd year of service	5,040
„ „ 1st year of service	4,560

4. The increments will be given for approved service only, and in accordance with the rules of the Department.

Exchange compensation allowance will not be granted to future entrants.

5. Promotions above the grade of Executive Engineer are dependent on the occurrence of vacancies in the sanctioned establishment, and are made wholly by selection; mere seniority is considered to confer no claim to promotion.

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[*] **Officers of the** Assistant Class **will** ordinarily **pass into the executive class in the 11th** year **of service,** but **no Imperial Engineer** may **draw more than Rs. 9,600** per annum **unless** he holds **charge of a division or a charge of** equal **importance.**

ANNEXURE IV.

Particulars relating to Pensions, Provident Fund, and Leave.—Not printed.

ANNEXURE V.

REGULATIONS AS TO THE PHYSICAL EXAMINATION OF CANDIDATES FOR APPOINTMENT TO THE PUBLIC WORKS DEPARTMENT OF THE GOVERNMENT OF INDIA.—Not printed.

APPENDIX VI.

(*Referred in paragraph* 81,308—*Mr. S. A. J. Keatinge's Evidence.*)

MEMORANDUM BY MR. S. A. J. KEATINGE, CHIEF STOREKEEPER, NORTH WESTERN RAILWAY, REGARDING THE DUTIES OF CHIEF STOREKEEPER AND STOREKEEPERS, STATE RAILWAYS.

1. *Indents on England.*—The duties of the Chief Storekeeper consist of the general administration of the Department. One of his principal undertakings is the preparation, estimating and control of indents for stores submitted on the India Office. He is solely responsible for indents for stores in general use and common to all Departments, and also exercises considerable check over indents for special stores peculiar to Departments and estimated for by them. These indents run into very large figures, and any action due to inefficiency or carelessness results in waste of expenditure. The average annual expenditure on this account on the North Western Railway amounts to about two crores of rupees. One of the essentials that the Chief Storekeeper should possess in this connection is complete knowledge of the uses of all stores, material, rolling stock and plant, so as to eliminate from estimates such items as are in stock, and which can be made adaptable and utilised.

2. *Purchases in India.*—Besides indenting on England, the Chief Storekeeper is Purchasing Agent in India for large quantities of stores, both of English and country manufacture. English stores are those which have not been provided for in indents on England owing to abnormal demands or unforeseen circumstances. Country stores are those indigenous to the country. In both cases certain standards have to be adhered to, and require more than general knowledge in their selection and purchase. Ignorance as to correct sources of supply, reasonable. rates or incorrect

or inferior articles would result in waste. The variety in country stores is great, both in quality and description. The average annual expenditure on the North Western Railway on account of such purchases in India. amounts to 30 to 40 lakhs rupees.

3. Stocks held.—In addition to procuring stores from England and purchasing them in India, large stocks have to be maintained to meet current requirements. These have to be correctly accounted for, suitably distributed, and served out to Departments on demands with despatch and accuracy. Organisation must be efficient, otherwise great confusion in accounts and stock ensues, besides delay in meeting requisitions. The stocks dealt with chiefly consist of permanent way material, locomotives and all parts, carriages and wagons and all parts, girders and bridge material, bridge building plant and machinery, workshop machinery, hand tools of almost every description made, electrical plant, electrical tools, electrical lighting and cooling apparatus and parts thereof, roofing material and fittings for buildings, metals of every description both in their raw and finished state, hardware in great variety, water and steam apparatus and fittings, timber of every description in bulk and in scantlings, furniture of all kinds, tents of all kinds, paints and oils in very great variety, cloth, clothing and uniforms, leathers and leather work, printing material, paper, stationery and all forms. These are most of the main heads, but their sub-divisions and diversity are very great. On the North Western Railway there are approximately 25,000 headings in ledgers, showing different descriptions or sizes. The value of stocks held on the North Western Railway at the end of calendar years 1902 to 1912 were as noted below :—

		Rs.
31st December,	1902	1,31,16,062
,, ,,	1903	1,34,47,037
,, ,,	1904	1,51,88,103
,, ,,	1906	2,00,90,945
,, ,,	1906	2,18,92,022
,, ,,	1907	2,31,97,958
,, ,,	1908	3,60,56,703
,, ,,	1909	2,83,24,471
,, ,,	1910	2,43,32,575
,, ,,	1911	2,93,62,750
,, ,,	1912	2,66,29,621

4. Control over *capital locked* up.—The Chief Storekeeper is required to exercise control over capital locked up in stores', and any reduction can only be accomplished by constant attempts to have stocks utilised by consuming Departments, such, for instance, as when complete vehicles are required; any surplus spare parts in hand are omitted from indents, and are provided in India, or when complete miles of track of permanent way material are wanted, all surplus fittings available in stock are omitted from indents. Sales to the public and transfers to other Railways have also to be effected; these transactions involve large sums, and require considerable resource and general knowledge. On the North Western Railway such sales and transfers will amount to 12 to 13 lakhs rupees before the end of current financial year. The reduction of capital locked up amounted to nearly one crore of rupees since 1908, as the figures in preceding paragraph show. This was effected notwithstanding considerable growth of the line during that period.

3. Plant and *Stores* returned *to* stock.—On completion of works large quantities of plant, machinery, tools and stores are returned to Stores to be taken back into stock or otherwise disposed of. The Chief Storekeeper and Storekeepers have to inspect, examine, correctly value and assess depreciation in the case of all such stores, besides arrange to have them completed and repaired, all that are fit for further use. In the case of plant and machinery, these undertakings require considerable practical knowledge to execute efficiently, otherwise false credits are afforded. On large Railways these transactions involve heavy sums. On the North Western Railway they run into 12 to 15 lakhs rupees per annum.

6. *M*erchants of the Bailway.—The Chief Storekeeper is practically the supplier or merchant for every article used on a railway, and the various departments are his constituents, but where he differs from the merchant in ordinary business is that the most merchants confine themselves to particular lines of manufacture, whereas the Chief Storekeeper and Storekeepers of Railways have to deal with almost every description of article manufactured in England and in India, and are expected—and should have sufficient knowledge and training to enable them—to transact all business connected with the multifarious descriptions of stores passing through their hands and in their charge. Such abilities are, therefore, more special than ordinary.

7. *Knowledge* of Shipping and *Port Rules.*—Chief Storekeepers and Storekeepers are required to possess considerable knowledge in regard to shipping and sea port rules. Stores and material landed at Karachi and Calcutta have to be taken over from steamers by Stores Officers located at these ports, and familiarity with all rules and customs of the sea, shipping and ports are essential, as damages to consignments and shortages have to be assessed, which give rise to great difference of opinion and disputes. Unless such cases are carefully handled by men of experience, considerable loss to the Railway can be incurred. The Storekeeper (North Western Railway) at Karachi, under the orders of the Chief Storekeeper, has to take over from ship's side and despatch to respective destinations about 4,000,000 tons of material annually, and frequently 8 to 10 steamers are discharging at the same time stores for the North Western Railway. Besides transacting this business for the North Western Railway, the Storekeeper at Karachi has to do similar work for every Government Department in the Punjab, Sind, Baluchistan, and Northern India.

8. Discipline of *Department.*—Owing to the great responsibilities and nature of their charge, discipline and control exercised by the Chief Storekeeper and Storekeepers has to be stricter and closer than in the case of other Departments because stores represent money, and losses by damage, thefts, neglect, or embezzlement would be great if any laxity prevailed. On the North Western Railway there are 8 officers, 400 subordinates and clerks, and 3,000 artisans and labourers to be controlled.

APPENDICES VII. AND VIII.

APPENDIX VII.

STATEMENT of the CIVIL APPOINTMENTS on Rs. 200 a Month and over held by EUROPEANS, ANGLO-INDIANS, and INDIANS on the 1st April 1913, in the RAILWAY DEPARTMENT.

Pay.	Number of Employés in each Grade or Class.															
				Hindus (including Sikhs and Parsis).												
	Total	Europeans	Anglo-Indians	Brahmans (including Shenvis).	Kshatryas.	Kaiyasthas (including Parbhus).	Baniyas and Vaisyas.	Sudras.	Other Hindus (i.e., other than those shown in cols. 5 to 9).	Total Hindus (cols. 5 to 10).	Sikhs.	Parsis.	Total Hindus, Sikhs, and Parsis (cols. 11 to 13).	Muhammadans.	Indian-Christians.	Buddhists.
1.	2.	3.	4.	5.	6.	7.	8.	9.	10.	11.	12.	13.	14.	15.	16.	17.
Rs.																
200—300	**19**	**4**	**3**	1	2	1	1	1	1	7	2	—	9	3	—	—
300—400	34	16	9	—	—	2	1	—	5	8	—	—	8	1	—	—
400—500	76	53	**18**	1	1	1	—	—	1	4	—	—	4	1	—	—
500—600	71	**55**	12	—	1	1	—	—	1	3	—	1	4	—	—	—
600—700	29	24	5	—	—	—	—	—	—	—	—	—	—	—	—	—
700—800	35	**23**	**8**	1	—	—	—	—	1	2	1	1	4	—	—	—
800—900	30	24	3	—	1	1	—	—	1	3	—	—	3	—	—	—
900—1,000	22	18	1	—	1	1	—	—	—	2	—	1	3	—	—	—
1,000—1,200	48	40	6	—	—	—	—	—	1	1	—	—	1	—	1	—
1,200—1,400	36	28	6	—	1	—	1	—	—	2	—	—	2	—	—	—
1,400—1,600	19	**17**	1	—	1	—	—	—	—	1	—	—	1	—	—	—
1,600—1,800	9	9	—	—	—	—	—	—	—	—	—	—	—	—	—	—
2,000—2,500	**11**	11	—	—	—	—	—	—	—	—	—	—	—	—	—	—
2,500—3,000	6	6	—	—	—	—	—	—	—	—	—	—	—	—	—	—
3,000—3,500	2	**2**	—	—	—	—	—	—	—	—	—	—	—	—	—	—
Total...	**147**	30	72	3	8	7	3	1	11	33	3	3	39	5	1	—

APPENDIX VIII.

OFFICIALS AND NON-OFFICIALS WHO FURNISHED WRITTEN EVIDENCE TO THE ROYAL COMMISSION IN CONNECTION WITH THEIR ENQUIRY INTO THE RAILWAY DEPARTMENT BUT WHO WERE NOT ORALLY EXAMINED.

1. Sir Pratul Chandra Chatterji, M.A., D.L., LL.D., Kt., C.I.E., Rai Bahadur, Lahore (on behalf of certain Indian Officers of the Railway Department of the Government of India).
2. D. A. Marriott, Esq., on behalf of the Temporary Engineers of the North Western State Railway.
3. F. S. Old, Esq., Executive Engineer, North Western Railway (on leave).
4. The Gazetted Officers of the Traffic Department, North Western State Railway.
5. The Gazetted Officers of the Locomotive, and Carriage and Wagon Departments. North Western State Railway.
6. The Gazetted Officers of the Signal Engineers' Department, North Western State Railway.
7. R. McLean, Esq., B.Sc., Assistant Engineer, Public Works Department (attached to the North Western State Railway, Karachi).
8. H. O. Weller, Esq., Executive Engineer, Eastern Bengal State Railway.
9. Chandrika Prasad, Esq. (Bombay).
10. Babu Motilal Ghosh, Editor. Amrita Bazar Patrika, Calcutta.

INDEX.

The numbers refer to paragraphs.

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